

# QUARTERLY REVIEW of PSYCHIATRY AND NEUROLOGY

Vol. 4 No. 3



July 1949

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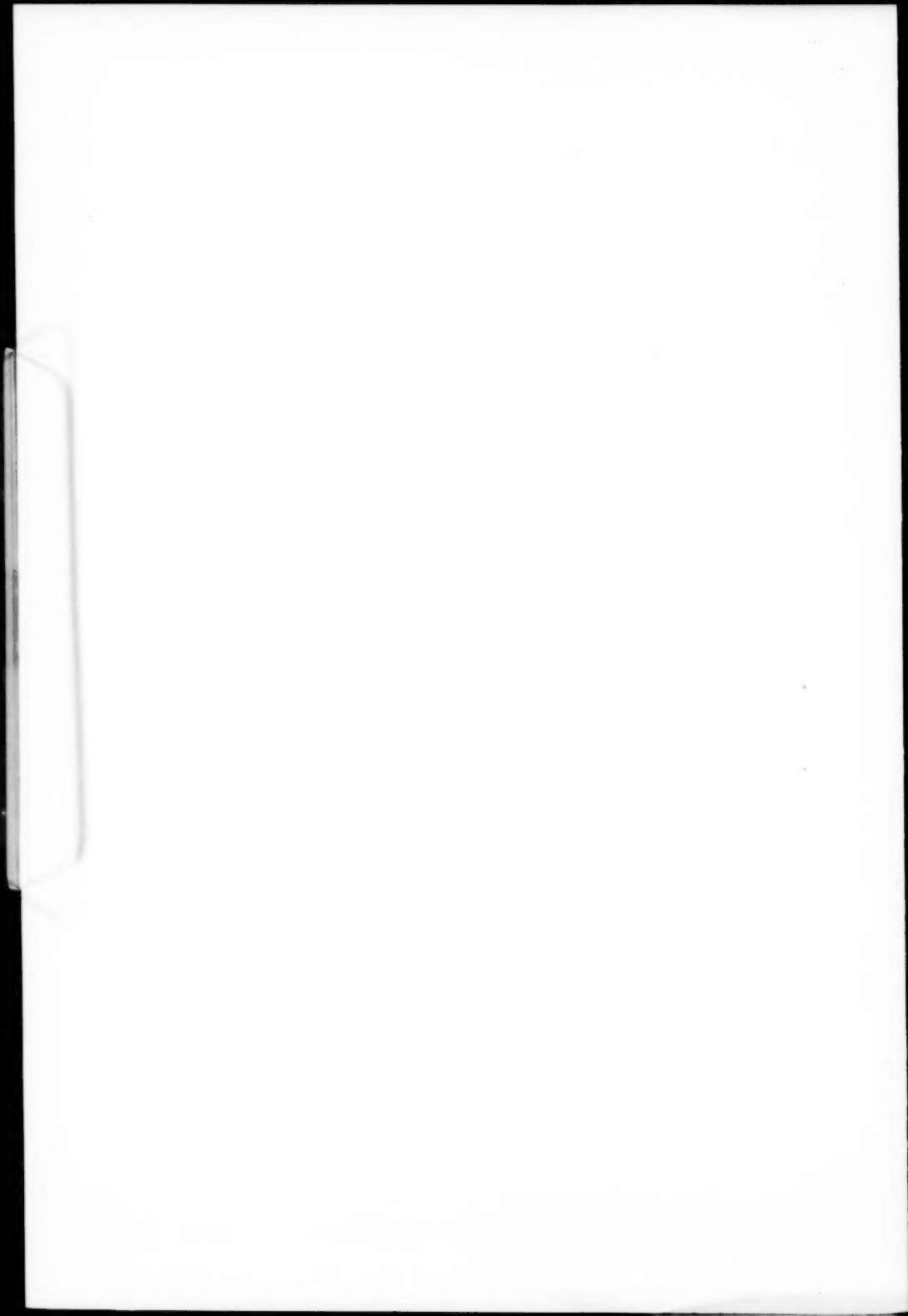
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## FOREWORD

THE purpose of the QUARTERLY REVIEW OF PSYCHIATRY AND NEUROLOGY is to present promptly brief abstracts, noncritical in character, of the more significant articles in the periodical medical literature of Europe and the Americas.

For reader reference, the abstracts are classified under the following general headings:

### PSYCHIATRY

1. Administrative Psychiatry and Legal Aspects of Psychiatry
2. Alcoholism and Drug Addiction
3. Biochemical, Endocrinologic and Metabolic Aspects
4. Clinical Psychiatry
5. Geriatrics
6. Heredity, Eugenics and Constitution
7. Industrial Psychiatry
8. Psychiatry of Childhood
9. Psychiatry and General Medicine
10. Psychiatric Nursing, Social Work and Mental Hygiene
11. Psychoanalysis
12. Psychologic Methods
13. Psychopathology
14. Treatment
  - a. General Psychiatric Therapy
  - b. Drug Therapies
  - c. Psychotherapy
  - d. The "Shock" Therapies

### NEUROLOGY

1. Clinical Neurology
2. Anatomy and Physiology of the Nervous System
3. Cerebrospinal Fluid
4. Convulsive Disorders
5. Degenerative Diseases of the Nervous System
6. Diseases and Injuries of the Spinal Cord and Peripheral Nerves
7. Electroencephalography
8. Head Injuries
9. Infectious and Toxic Diseases of the Nervous System
10. Intracranial Tumors
11. Neuropathology
12. Neuroradiology
13. Syphilis of the Nervous System
14. Treatment
15. Book Reviews
16. Notes and Announcements

In fields which are developing as rapidly as are psychiatry and neurology, it is obviously impossible to abstract *all* the articles published—nor would that be desirable, since some of them are of very limited interest or ephemeral in character. The Editorial Board endeavors to select those which appear to make substantial contribution to psychiatric and neurologic knowledge and which promise to be of some general interest to the readers of the REVIEW. Some articles, highly specialized in character or concerning a subject already dealt with in an abstract, may be referred to by title only at the end of the respective sections.

The Editorial Board will at all times welcome the suggestions and criticisms of the readers of the REVIEW.

WINFRED OVERHOLSER, M.D.

*Editor-in-Chief*

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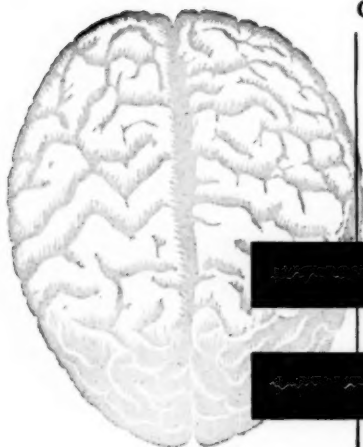
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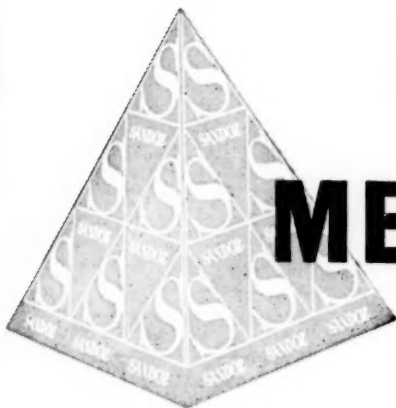


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# QUARTERLY REVIEW

## OF

# PSYCHIATRY AND NEUROLOGY

July, 1949

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ORIGINAL CONTRIBUTIONS

*Presented before  
the Eleventh Annual Meeting of  
The Medical Society of St. Elizabeths Hospital  
Washington, D. C.  
November 20, 1948*

PARKINSONISM AS A SEQUELA IN HEAT STROKE

F. REGIS RIESENMAN, M. D.  
Saint Elizabeths Hospital, Washington, D. C.

THE ADMINISTRATION OF ELECTRIC SHOCK TREATMENT  
TO A PATIENT WITH PURULENT BRONCHIECTASIS  
AND FOLLOWING PNEUMONECTOMY

MILTON M. PARKER, PH. D., M.D.  
Columbus, Ohio

THE PSYCHIATRIST AS A CONSULTANT TO THE COURT

GENEVIEVE MARGARET STEWART, M. D.  
Philadelphia, Pa.

Parkinsonism as a Sequela in Heat Stroke.\**F. Regis Riesenman, M. D.,  
Saint Elizabeths Hospital, Washington, D. C.*

Nervous symptoms following an attack of heat stroke are not of uncommon occurrence. Numerous reports relative to the neurological aspects of this condition have appeared periodically in the literature since Hiller's<sup>1</sup> series of four hundred thirty-five cases reported in 1902. The development, however, of a specific syndrome is felt to be comparatively rare. Review of the literature reveals that eight cerebellar syndromes following heat stroke were reported, but there was no instance of a Parkinsonian syndrome cited. The fact that this may be the only instance of such a case has prompted this report.

\* Presented before the eleventh Annual Meeting, Medical Society of St. Elizabeths Hospital, Washington, D. C. November 20, 1948.

Among the more common of the neurological residuals occurring are headaches, vertigo, impaired memory and concentrative powers, mild personality changes as manifested by altered conduct and disposition, irritability, emotionalism, and mental deterioration. Motor phenomena consist of monoplegia, hemiplegia, paraplegia, facial palsy, and speech disorders. Ocular and visual features include scotoma, hemianopia, amaurosis, optic neuritis, and retinitis. Psychotic, neurotic, and psychopathic states are not of infrequent occurrence.

In 1944 Freeman<sup>2</sup> reported a case which presented the classical symptoms of a cerebellar syndrome appearing within forty-eight hours after the onset of illness. The patient survived a period of extreme hyperthermia for about fourteen days. Freeman also reports a case of cerebellar degeneration (with post mortem) in a patient who died after about twenty hours of hyperpyrexia associated with heat stroke.

Review of the literature reveals that there were six more cases reported in which there was evidence of cerebellar involvement. Three of the cases died so suddenly that the clinical evidence of cerebellar involvement was not apparent, but characteristic pathological changes were found post mortem. The other three cases presented clinical evidence of the cerebellar syndrome. Freeman's excellent report cites these instances and discusses them in some detail.

#### CASE REPORT

A white male, age 25, a private in the United States Army, was admitted to an Army General Hospital at 7:30 P.M. on August 5, 1944, in a state of deep coma. His skin was very dry and hot, pulse 160 full and bounding, respirations 60, temperature 110° plus (F), rectally. Patient had frequent episodes of vomiting and diarrhea during his first few hours of hospitalization.

Therapy consisted of ice packs, intravenous saline solution, with glucose and blood plasma. At 10:00 A.M. his temperature had dropped to 101.6, pulse rate 122, and respirations 32. At 9:00 P.M., or one and a half hours after admission, generalized muscular twitching were noted and one-half hour later the patient developed a generalized convulsion and during the next twenty-four hours he had more convulsions. The temperature dropped to 99.8 within six hours of his admission, but the next day it became elevated and averaged about 103 for six more days. Pneumonia developed on the third day in the hospital. The patient remained in coma for several days, and was irrational and confused for several more days. It was not until August 12th that he became rational, but he was unable to speak until August 20th.

The following story was related at that time. The patient considered himself in good health prior to entering the service and had enjoyed the best of health during the year's time he had spent in the Army. While engaged in the process of setting up a field tent during a training problem at a camp in Texas on August 5, 1944, on an extremely hot afternoon, he

experienced a sensation of dizziness, followed by headache and generalized weakness. He marched back to camp, following completion of the problem, and, feeling no better, lay down on his bed to rest. The next conscious moment he experienced was in the hospital one week later. His family and previous personal history were irrelevant.

Laboratory reports: Urine: 8/7/44 albumin 2 plus; many casts. 8/9/44 albumin trace, few casts; 15 pus cells, occasional red blood cell. 8/24/44 urinalysis negative. Blood: 8/6/44 RBC 4,900,000; Hb. 14.5; WBC 10,900; 74 polys, 26 lymphs, hematocrit 58. Blood chemistry: 8/5/44 NPN 36; chlorides 380, sugar 76. 8/6/44 NPN 50, chlorides 330, sugar 120. X-ray of chest 8/8/44 reported early bronchial pneumonia on the right side. 8/11/44 X-ray reported diffuse bronchial pneumonia. Spinal tap: dynamics normal and fluid normal.

Subsequent course: Neurological evaluation of the case was requested at the fifth week of hospitalization, prior to final disposition, because of the presence of residual findings pointing to involvement of the central nervous system.

Neurological examination: The following were the significant findings: horizontal nystagmus on left lateral gaze, with the quick component in the direction of the gaze. The speech was thick, slurred, and monotonous. There was a slow, rhythmic tremor of the tongue, and a grade three masking. The eyes had a vacant stare. A mild cogwheel phenomenon was evident in the upper extremities, muscle tone was increased, and there was some loss of associated movement in walking. There was a grade two ataxia, and incoordination of the upper and lower extremities. Rapid, alternating movements were poorly performed, and slight dysmetria was noted on the left. The patient swayed to the left when standing in the Romberg position with eyes open, and gait was ataxic with shuffling and a tendency to drift to the left. Deep reflexes were hyperactive grade two, and no pathological reflexes were elicited. A slight, rhythmic tremor of the hands was present. The patient was generally slowed up mentally and physically, and some mental deterioration was evident.

During the course of the next four months, frequent examinations revealed that there was no change in the patient's condition, and he was subsequently discharged to his home, with the diagnosis of Parkinsonism, secondary to heat stroke.

#### COMMENT

The outstanding clinical picture presented by this patient was that of Parkinsonism. There was, however, a fairly well developed associated cerebellar syndrome. The process seemed widespread involving the cerebellum, the basal ganglia and mesencephalon.

Parkinsonism is an expression of extrapyramidal involvement. Facts associated with the development of the process are of protean character.

Among the most common of the contributory factors are: encephalitis epidemic and cryptogenic forms; cranial trauma; toxic substances, e.g.

carbon monoxide, carbon bisulphide, manganese, hydrocyanic acid, salvarsan, veronal, thallium, phosphorus, and radium. Severe alcoholic or colchicum preparations ingested over a long period of time may be associated with Parkinsonism. The clinical picture is reversible, however; since discontinuance of the habit or drug causes improvement. Cerebrovascular causes are arteriosclerosis, hemorrhage, and thrombosis. Transient Parkinsonism is, at times, associated with poliomyelitis. Acute multiple sclerosis may, at times, produce the syndrome. Such a case was seen by the writer. Recovery was complete six months after the appearance of symptoms. Finally, cases have been reported of neoplastic, syphilitic and malarial etiology. The writer also saw a case of well-advanced Parkinsonism in a patient who had paresis.

### CONCLUSIONS

1. A case of Parkinsonism as a sequela of heat stroke reported.
2. The cerebellar syndrome following heat stroke previously described by Freeman<sup>2</sup> and others was also a part of the clinical picture in this patient.
3. A discussion of other neurological sequela in heat stroke, together with the various types of Parkinsonism, are included.

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The Administration of Electric Shock Treatment To a Patient With Purulent Bronchiectasis and Following Pneumonectomy.\* *Milton M. Parker, Ph.D., M.D.* Columbus, Ohio.

The patient was a thirty-eight year old, white female who had been referred for a bronchogram, and was admitted to the University Hospital at Columbus, Ohio on March 29, 1947. It was noted by the admitting physician that the patient was both nervous and depressed. The basis for the referral dated from twelve years previously when the patient had developed a highly productive cough following a lobar pneumonia. Following the pneumonia and the development of the highly productive cough, the patient was examined on the Research Surgical Service where a diagnosis was established<sup>1</sup> of bilateral lower lobe bronchiectasis. Repeated sputum smears made for acid-fast organisms were negative. The degree of bronchiectasis at that time was considered not sufficient to warrant surgery, and the patient

\* Presented before the eleventh Annual Meeting, Medical Society of St. Elizabeths Hospital, Washington, D. C. November 20, 1948.

<sup>1</sup> By George M. Curtis, M.D., Chairman, Dept. of Surgical Research

was discharged to the care of her local physician. On admission in March, 1947, the patient was expectorating up to one cup per day, mostly in the morning. The sputum was yellow, thick and foul. Within the month preceding admission to the hospital, the patient had had six bouts of hemoptysis at varying intervals.

The past history revealed that the patient had never had any serious injuries or illnesses, and, with the exception of the attack of lobar pneumonia already mentioned, and whooping cough as a child, she had had no respiratory diseases. There had been no previous operations of any kind. The patient had an unremarkable menstrual history except that her periods were slightly irregular in the three years preceding her admission to the hospital.

Psychiatric examination of the patient revealed a severely depressed, agitated woman who related that her depression had started approximately three years before, and had been growing gradually since that time. She admitted having entertained suicidal ideas, but had made no attempts. The patient expressed a lack of concern regarding any treatment which might be administered her, saying that she had no desire to live.

The bronchograms performed on April 1, 1947 were reported to show "—complete filling of all lobes with left basal bronchiectasis which shows a lack of elastic contraction fluoroscopically. There is some bronchial widening in the right base posteriorly which, however, still contracts with respiration. Conclusion: Left basal bronchiectasis with severe chronic bronchitis in the right base."

Because of the patient's obvious, marked depression it was decided to defer surgery for Electric Shock Treatment. Blood and urine examinations were normal. The electro-cardiogram was reported<sup>2</sup> as "—borderline EKG, possible myocardial pathology." The patient's vital capacity, measured daily, varied between 1900 and 2900 c.c. All physical findings, including gynecological findings, were normal with the exception of moist rales in both lung bases.

Between April 11, 1947 and April 25, 1947 the patient was administered seven Electric Shock Treatments of the conventional type. Each treatment was preceded by the administration of Tubocurarine, 3.5 c.c. intravenously, and each treatment was followed by the administration of one ampule of Prostigmine (1:2000) intravenously. In each treatment the patient experienced a generalized grand mal convulsion with tonic and clonic stages. At no time was there any difficulty with respiration. As a precautionary measure the patient was placed in a position of postural drainage following each treatment. The patient responded well to the course of Electric Shock Treatments and was discharged to her home on April 26, 1947.

On May 3, 1947 the patient was readmitted to University Hospital for surgical consideration of her bronchiectasis. At this time the patient showed

<sup>2</sup> By Donald Mohanna, M.D., Director of Electrocardiography

no signs of depression, tearfulness or agitation and she looked forward to surgery with eagerness. On May 6, 1947 bronchograms were again performed with the same conclusions being reached as before. On May 7, 1947 the patient underwent a left pneumonectomy. The results of the pathological examination of the left lung were reported<sup>3</sup> as follows: "(A) The upper lobe weighs 110 grams. The pleura is smooth and glistening except for a few fibrous tags posteriorly. There is a firm subpleural nodule, measuring 1 x 0.8 cms., near the central portion of the periphery of this lobe. Cut section of this nodule shows it to be completely calcified and extends approximately 1 cm. into the lung substance. The parenchyma is dry and atelectatic with a considerable amount of frothy mucoid material in the bronchi which do not appear to be normally dilated. (B) The lower lobe weighs 140 grams and the pleura is smooth and glistening except for a few fibrous tags posteriorly. The organ is small, subcrepitant and on cut section is dry and atelectatic. The bronchioles near the hilus showed tubular dilation and were filled with a tenacious mucoid material.

#### MICROSCOPIC

- (A) Hemorrhagic atelectasis with some cystic dilatation of the bronchi.
- (B) Bronchiectasis with hemorrhagic atelectasis. Chronic peribronchial inflammatory reaction." Following this surgery the patient developed a fluid level in the left chest up to the fourth interspace and developed some intercostal pain on the left side. Following the removal of the fluid by thoracentesis and the local installation of 200,000 units of Penicillin, the patient made an uneventful recovery. On May 27, 1947 the patient was discharged from the hospital.

On September 19, 1947 the patient was readmitted to University Hospital manifesting essentially the same condition as seen earlier of agitation, tearfulness, depression and suicidal tendencies. It was obvious that the use of Electric Shock Therapy was essential, but some doubts were entertained as to the advisability of administering Electric Shock to a patient with one lung. A perusal of the literature available at that time failed to disclose any report of a similar instance. Daily determinations of vital capacity at this time showed that the vital capacity varied between 1600 and 2100 c.c. It was decided that in the absence of other physical contraindications, and in the presence of the vital capacity reported, that the patient could withstand successfully a second course of Electric Shock Therapy. As a precaution, the services of an anesthetist were obtained with the idea that, if the patient encountered a respiratory difficulty, forced breathing might be required.

Between September 25, 1947 and October 7, 1947 the patient was administered a course of six Electric Shock Treatments using curarization before each treatment, but no Prostigmine following the treatment. Each treatment produced a grand mal convulsion of the usual kind which was followed in each instance by uneventful re-

3. By Harry L. Reinhart, M. D., Professor of Pathology

covery. At no time was there any unusual apnea or cyanosis. It was not necessary to resort to the administration of oxygen with or without forced breathing following any of the treatments. On October 9, 1947 the patient was discharged from the hospital in excellent spirits, and completely relieved of the depression and agitation with which she had been readmitted to the hospital. After her discharge from the hospital, the patient was followed on an out-patient basis with psychotherapy. No further resort has had to be made to Electric Shock Therapy.

The Psychiatrist As A Consultant To The Court.\* *Genevieve Margaret Stewart, M.D.* Philadelphia, Pa.

Twelve years ago after a pretty sharp encounter in court a judge said to me, "If I could trust a psychiatrist I could use one. I suppose my wish is futile, because, as an advisor to the court, the psychiatrist would be paid by the County, which can't meet the fancy fees commanded by the expert who testifies to help win a case".

In our County it was a new idea that psychiatry might be useful to the court, and the new judge had considerable courage to bring up the subject. The experience of the older judges had been that in using psychiatrists they witnessed a battle between experts baited by lawyers and conducted mostly in a language few people could readily understand. Such displays seemed to them to cast little light on the issues involved in a case.

Of necessity, the focus of a court trial is on the individual in his social setting. The verdict revolves around several basic questions. In what manner has the accused offended the mores of his environment; to what degree should he be held responsible for his acts; does society need protection from him; does he need protection from society:

Since the qualified psychiatrist has been trained to study the individual, he possesses a valuable insight that the court can use in understanding the cause and effect of the prisoner's personality structure, and his relative ability to function in socially acceptable ways. An alert and thoughtful court wishes to know these things.

The servants of the law, lawyers as well as judges, thoroughly versed in the legal and social implications of an act, and prepared in the processes of the law to answer the question, "Did he do it?" are not able to satisfy the next question. When a court asks, "Why did he do it—how is it possible for him to have done such a thing?" it is taking more account of the offender than the offense, it is beginning to function for the welfare of the individual rather than merely to satisfy the vengeance of society. Slowly the courts are recognizing that it is prophylactic and not sentimental to take every aspect of the nature of the individual and his setting into account in the disposition of each case.

\* Presented before the eleventh Annual Meeting, Medical Society of St. Elizabeths Hospital, Washington, D. C. November 20, 1948

To this whole study the psychiatrist can contribute only a part, but a valuable part. He can describe the dynamics of the personality, he can deduce its potentials for reaction to environmental stimuli, he can determine the degree of stress the individual can withstand, and he can predict with fair accuracy what the prognosis for social adjustment would be under certain circumstances. This highly relevant material judges want to know in addition to the facts of the crime and the usual record of an offender's personal history.

The judicial aspects of a case, given the facts, are almost automatically revealed to those skilled in the law. Psychiatrists are not judges and they are out of place when they assume a judicial role. The psychiatrist who permits himself to be trapped into devising an answer to the question, "Is the prisoner guilty?" is infringing upon the judge and the jury's prerogatives. Appearing as a witness for or against the State the psychiatrist's opinion can be interpreted only in the implications of that question. Since the whole trial pivots on this question, the psychiatrist cannot in any possible way be considered to be giving an impartial opinion when he is summoned to the stand by a trial lawyer. Furthermore, he exposes himself to being harried, and picked apart, and jeered at, by the opposing lawyer, in an effort to minimize the weight of an opinion which deserves respect and quiet consideration.

After enduring one of these scenes once, I asked a judge, "Is it possible for the court to refuse to admit a witness and to rule out his testimony as irrelevant to a case—even an expert witness chosen by a lawyer?" The judge answered, "yes". I then went further to ask him, "If a court were to reserve the privilege of calling its own psychiatric consultants and appointing its own psychiatric commissions, would it be consistent with the state laws of Pennsylvania?" To my surprise the answer again was "yes". Since that time, whenever a lawyer has called me on a case I have suggested to him that if he really thinks a psychiatric study appropriate for his client, he makes the proposal to the judge concerned. If I receive a request from the court for such an examination, I see the client at once. Before the court order for a psychiatric examination is issued the judge has attempted to gain the opposing lawyer's approval to the examination, and also his consent to the use of the designated psychiatrist. If the consent of both lawyers cannot be obtained, and the judge considers a psychiatric opinion is indicated, he appoints a commission containing no psychiatric favorites, and he asks for a composite opinion to be presented by two psychiatrists and one lawyer. The report is sent directly to the presiding judge. When a single psychiatrist is acceptable to both lawyers, the written opinion is sent to the judge and copies are sent by him to each lawyer before the trial is held. Except in a hotly contested case, it is usually not necessary for the psychiatrist to appear in court. If the judge considers it important to have the psychiatric opinion on the record of the trial, of course it must be given from the witness chair. It is thus available for the use of those reviewing

the case in higher courts. When the psychiatrist is asked to appear at the trial as an expert called by the judge, he, as well as the lawyers, asks questions useful to the development of the case. These questions tend to elucidate and expand the written report given earlier. They are not pointed to detract or minimize the implications of the psychiatrist, but to clarify them. The psychiatrist finds that he is in the proper position of a person conferring with other professional people having mutual respect, in an effort to arrive at greater understanding. He finds himself comfortable, respected, and efficiently related to the search for truth in a case. In short, he is being treated as an expert in his field, and he is serving as a valuable advisor to the court. It is worth his time and his best effort.

In order that one psychiatrist may not dominate the scene and officials begin to feel that they "believe" in this one person to the exclusion of all other equally qualified psychiatrists, it is helpful for the person initiating the processes I have just described, to include alternate psychiatrists as soon as possible, and to dispel the notion that particular persons are uniquely gifted as consultants to the court. Those recommended should be chosen on the basis of training and interest, and only those of demonstrable qualifications should be recommended to carry so responsible an advisory role. Fortunately *The Directory of Diplomates of the American Board of Psychiatry and Neurology* is ready to hand, and the persons therein listed can be asked their willingness to serve the courts in this way. The court thus acquires a register of qualified psychiatric consultants from whom one or more may be chosen by the judges to give an opinion in a particular case. The court thus becomes confidently aware that *psychiatry* can be useful and not that "Dr. So-and-so can tell us what we need to know here, and goodness knows what we'll do when he's on vacation—or dead".

Since the service rendered to the court is a consultant one, desired and respected by the court, there should be remuneration for it. In my experience an acceptable fee for a written opinion has been commensurate with that stated by the Veterans' Administration for a mental examination. An additional fee has been paid without question for appearing as witness in court, and the greatest consideration has been shown in appointing a time for the testimony, and interfering as little as possible with a busy private practice.

Here and there in this country there are psychiatrists and courts that have thoughtfully and patiently organized psychiatric consultant services. In these places it is noteworthy how well the special skills of psychiatrists assist the courts in their struggle, not only for justice, but also in the illumination of the dark places of society that breed crime and misery. However, such cooperative endeavors are exceptional rather than usual, and I hope I shall not be regarded as impertinent if I suggest to my colleagues that psychiatrists ponder their position as expert witnesses in courts and their motives and methods in presenting their skill.

There is wide misuse of psychiatry both by lawyers and psychiatrists lacking definition and foresight. The lawyer wants more insight (let us

say he doesn't want just to win his case), the psychiatrist is well-meaning and wishes to contribute to social welfare in the larger sense, and so the two put on a public display in which neither goal is achieved. Courts and lawyers are asking of psychiatrists—what can you do to help us? Can you contribute anything other than confusion? If psychiatrists can say, "This we can do, this is within the realm of our discipline and knowledge: we can show you the personality structure and capacity of the client, we can tell you his relative ability to act in socially acceptable ways. This alone is within our area of expert knowledge. If an opinion on these things will help your perspective on the case, it is worth having"—then perhaps the ends of greater understanding and social welfare will be achieved in a justice which not only holds the scales to measure out punishment, but has eyes unblindfolded and sees the manner in which it may best be applied.

My plea is that psychiatrists study their relationship to the courts and especially, that those not formally connected with the court join those who are, in defining and bringing before the judges the manner of their greater benefit to the individual brought to justice.

If this study of the individual criminal were to confine itself merely to a diagnostic exercise for the psychiatrist, it might lack incentive after the monetary aspect is minimized. However, in my years of part-time work with both the juvenile and adult divisions of the local county court, my experience has been that a survey of the cases has drawn some very pertinent conclusions about the lacks in our local social structure. It has been possible to make these deficiencies known to study-planning committees, who in their turn slowly work toward bettering situations productive of crime.

The psychiatrist's knowledge of the stimuli to which the particular delinquent will most favorably respond, is the guiding finger along the way. Where adequate facilities do not exist, their absence is soon made apparent, and efforts may be directed toward the eradication of these lacks. Social Mental Hygiene is involved. It is not beyond the scope of a county mental hygiene committee, headed by a psychiatrist, to study the resources available for psychotherapy to children, for psychological testing in schools, for special schools and classes for children not quite average, for supervised recreational and social facilities and camps in districts shown by juvenile court statistics to be deficient.

It would be entirely reasonable to say that in our county two-thirds of the delinquents drift into crime for the lack of something better to do. Ninety percent of them are from inadequate or broken homes. There are few crime-breeding areas such as larger cities describe. It seems entirely possible, and indeed it has been demonstrated, that during the five years in which a diagnostic clinic has been functioning in our county, the delinquency rate and the repeater percent have fallen by one-third. The double approach of this clinic has been to help define the causes for delinquency in each individual offender, and also, from the definitions, to help eradicate their social causes. Both these roles are consultant ones.

The court's use of the psychiatrist has been described. The citizens' use of counseling concerning social ills is also possible, especially if the psychiatrist does not seek to dominate or to be too active in controlling the action groups who are trained in the business of social welfare. Let the psychiatrist be a consultant, let him be an expert in that which contributes to the welfare and the breakdown of the individual personality, but let him make himself available to contribute his knowledge to others who are also concerned about social welfare in the larger sense. It is well known that what is true for the individual is also true for a town or a nation composed of individuals. Psychiatrists can be very helpful in the jobs already designated as theirs diagnostically and therapeutically, but they can also, as citizens of the world, contribute their skills toward making a better world, beginning in their own county and especially in its courts.

GENEVIEVE MARGARET STEWART, M.D.

November, 1948

## PSYCHIATRY

### 1. Administrative Psychiatry and Legal Aspects of Psychiatry

Prefrontal Lobotomy and the Courts. *Edward E. Mayer, Criminal Court, Pittsburgh, Pa. J. Crim., Chicago. 38:576-83, Mar.-Apr. 1948.*

A male, 37 years old, with a long career of crime was arrested and permitted before trial to enter a hospital to have a prefrontal lobotomy performed in an attempt to cure the prisoner of his criminal tendencies. After his return to jail, no change in intelligence was observed. There did not appear to be much alteration of personality in terms of his style of responses. In some of the psychological tests some slight differences in attitudes and self-objectiveness were noted. But they were not conclusive changes and did not justify the opinion that this man would not at some future time perhaps again commit a felony. There was no noticeable alteration of his egocentrism when last examined. It certainly had not decreased. Nor had the operation produced any noticeable change in his ambivalent tendencies. His superego was still a weak one. Inasmuch as the clinical effects of such an operation are not entirely established, the time has not arrived when this operation should be offered to a court and accepted as a pre-sentence procedure.

### 2. Alcoholism and Drug Addiction

Present-Day Status of Medical Psychological Aspects of Alcoholism. *Robert V. Seliger, Baltimore, Md. Psychiat Q. Suppl. 22:7-23, Pt. I, 1948.*

Alcoholism is a serious national health problem and it is also a social problem requiring new and different social attitudes about excessive uncontrolled drinking. The alcoholic is a sick person who needs competent medical and psychiatric care, treatment, and follow-up supervision. The only possible goal for the alcoholic lies in his never again taking a drink. The only possible goal of treatment, along whatever lines, therefore, is the well-known

fact of total permanent abstinence for the ex-alcoholic. The latter should not be made to feel, either in the home or community, that his illness was a crime. He should receive every possible proof of moral support in maintaining his health and the same sort of consideration—no more and no less—that an ex-tuberculosis patient receives. To aid in the prevention of alcoholism, greater stress on sound physical and mental health habits and on the emotionally important elements of family and religious life, with lessened pressures of speed and dollar-sign success would, it is felt, help decrease the production of many emotionally immature, early neurotic, early psychotic, and incipient alcoholic personalities.

From the practical standpoint, prevention and treatment both, would be best organized and instituted to serve the community through: (1) Information centers where material could be obtained by the public and and through which contacts with medical and psychiatric set-ups could be made. (2) Thorough, factual courses on alcoholism, its treatment and prevention, given in all our medical, nursing and social service schools. (3) A hospital or section of it in every state where patients with alcohol problems could be properly treated and given the medical-psychological services they require. (4) State hospital set-ups for the treatment of certain alcohol patients. (5) State farms where physical rehabilitation and social psychiatric help under the supervision of a psychiatrist would be available. (6) Extramural clinic centers, located near the "alcohol hospital" or information center, to serve as diagnostic units, treatment units, social service units, and training units for workers in this field of behavior illness. (7) A concerted program of education against heavy drinking, beamed at the reading and listening public—including the teen and twenty-agers—and supported as a public health service.

### 3. Biochemical, Endocrinologic and Metabolic Aspects

*See Contents for Related Articles*

### 4. Clinical Psychiatry

On the Intense Affects Encountered in Treating a Severe Manic-Depressive Disorder. *W. Clifford M. Scott, London.* Intern. J. Psychoanalysis. 28:139-145, 1947 Pts. 3-4.

The author relates some conclusions reached in treating manic-depressive states, where intense anger, love, fear and grief of a pathological degree were found. Inhibitory symptoms such as silence and stupor, and excitatory symptoms such as elation and manic flight may be analysed and related to the specific fantasies derived from instincts, to the associated anxieties and to the resulting defenses. He describes the different phases of the psychoanalytic treatment of a young woman of twenty years. After about seven months of analysis the first emotional outbursts began to occur, accompanied

by some kind of convulsions. Until then she was almost completely silent, with frequent abnormal sleepiness. These periods lasted up to forty minutes. Later the emotional outbursts were noted to be more those of anger or of love, and there were alternating elations and depressions. He believes that in psychoses what may at first seem to be almost conscious or at least pre-conscious, material is often deeply unconscious. Certain new developments in the technique of psychoanalysis enable the analysts to understand and to relieve even severe psychoses. These techniques are: a) the analyst should be able to tolerate the intense anxieties and violent emotional outbursts of the patient, b) he should be able to accept and follow the minute detail of the behavior and the display of feeling of the patient as well as the subtleties of his verbal expression and behavior and c) he should try to understand the extraordinarily complex interplay between the mechanism of introjection and projection and the relationship of internal and external objects. The analysis of every psychotic can add something to the understanding of child psychiatry; explains how and why.

Male Kleptomanias (*Über Kleptomanie beim Manne*). V. Baer-Hess, University of Zurich, Switzerland. Mschr. f. Psych. u. Neurol. 116: No. 4, 224-50, Oct. 1948.

The illustrative case reported involves a man, 40, of distinctly effeminate type both in personality and physical appearance. The slight build, sparse beard growth, flabby muscles, lack of energy, high-pitched voice, suggested an adolescent boy at puberty rather than an adult man. The case history showed late puberty (at 21). This underdeveloped state remained unchanged during the next twenty years of the patient's life. His attitude too was characteristic, in that he showed no particular interest in, or consideration for, the stolen object. This is typical of women, adolescents and homosexuals, actual or latent, since here the desire to steal is a manifestation of compulsion neurosis which results from mental depression. Normally developed mature men show little tendency toward kleptomania and the few cases on record suggest that to this type possession of the coveted object is a substitute for sexual satisfaction, hence this object becomes a sort of fetish. 40 ref.

The Development of the Psychologic Tendencies in Psychiatry. (*Entwicklung der psychologischen Richtung in der Psychiatrie*). E. B. Strauss, University of London, London, England. Deutsche med. Wchnschr. 73: 145-47, No. 13-16, April 9, 1948.

In addition to the marked advances in the physical methods of treatment in psychiatry is noted the marked activity also in the field of psychological methods. The most striking development in this realm is perhaps that of narco-analysis. In all the modalities employed in this work (sodium amytal, pentothal, laughing gas and oxygen, light ether narcosis, etc.) the aim is

generally stated to be the abreaction of Breuer and Freud, that is, the attempt to bring the repressed material out into the open and effectuate its recognition by the conscious mind of the patient. This method may be used in a diagnostic sense in that it may distinguish between true depressive states, the catatonic state and the hysterical inhibitive conditions. It is also used purely for therapy as described above or with the idea of rendering the patient more accessible to psycho-analysis. In this regard the author repudiates the sensational term "truth-serum" as employed by journalistic writers, particularly in the United States, and points out in this connection that the matter thus brought to light by the "truth-drug" (sodium amytal) is often so fantastic or so colored by the patient's mental quirks as to be useless for forensic purposes.

At the present time the pentothal narcosis is being combined with Methedrin injections as a form of abreaction. The method has a powerful effect in removing inhibitions and seems to bring about a marked emotional relief, and is especially effective in the traumatic neuroses.

Another development in the practical therapy of the traumatic neuroses is group-therapy. Many forms of this type of therapy are current in Great Britain. Perhaps the most widespread forms are the open psychotherapeutic groups and the closed groups. These groups are never composed of more than 8 patients, with or without the leadership of a psychiatrist. In the open groups the patient may withdraw but is immediately replaced by another, while in the closed groups the same patients are present from the beginning to the end of the course of therapy. This group therapy is often merely a preliminary course of therapy to enable the patient to adjust himself to his environment; again it is recommended to the patient during the period while he is receiving his clinical treatment; finally group therapy forms a part of the subsequent ambulant therapy. This ambulant treatment helps the former patient to reassume social relationships with the outside world and also to increase his self reliance and modify his personal view points. An example of these gatherings is the "Phoenix Social Clubs" of the St. Bartholomews Hospital in London, where the activities consist of concerts, art classes, vocal and graphophone recitals, dancing and excursions. The activities of the other groups consist mainly of lectures by psychiatrists, group discussion (Bierer) and group psychoanalytic sessions (Schilder; Foulkes). In this latter work the psychiatrist functions rather as a "good uncle" than as a moderator. The manner of procuring the effects by this method is still unclear, but it seems to work in the same manner as that of religious conversion: "one must feel inwardly". The method serves to explain the nature and source of the tensions existing between the individuals of the same group and as such promises to be of great value for the future social psychiatry.

Self Inflicted Prefrontal Lobotomy. A Case Report. *James W. Papez, Cornell University, Ithaca, N. Y. and Elwyn M. Smolen, Columbus State Hospital, Columbus, O.* J. Nerv. & Ment. Dis. 108:477-84, December 1948.

This was a case report of a 63 year old man who attempted suicide by shooting himself through the right temple with a revolver. The bullet passed through the middle of the prefrontal cortex and came out in the left temple. He made a stormy but satisfactory recovery. Nine weeks later he was admitted to a mental hospital because of personality changes. He showed placidity, mild euphoria, some confusion, impaired memory and attention, disturbed associative processes, no concern for future, limited ideation and foresight, outbursts of laughter or crying, poor voluntary control of hands, and carelessness in speech, reading and thinking. Some of the deterioration was probably related to his alcoholism prior to the shooting. Neurological defects of manipulation were related to path of bullet close to the middle of the precentral motor cortex. The chief defects resembled those following prefrontal lobotomy. The alcoholism, course of the illness, and present clinical status were described.—*Author's abstract.*

Symbolic Dream—Images in the Hypnagogic State (*Über den Symbolismus der hypnagogischen Vorstellungen*). *I. A. Caruso, Innsbruck, Austria.* Schweiz. Zschr. Psychol. 7: No. 2, 87-101, 1948.

Observations on a number of normal subjects confirmed the generally accepted view that hypnagogic dreams are not a sign of pathology but a part of the protective mechanism safeguarding transition from sleep to wakefulness and vice versa. Among the various types of healthy individuals, the extraverts tend to forget the content of such dreams and therefore ignore their existence, since they fall asleep more rapidly, i.e., lose consciousness at a higher rate.

The hypnagogic phase bears some signs of mental confusion, the degree varying with the personality type and, in the individual, with the degree of fatigue. However, these images are different from hallucinations and should be regarded as illusions. They may be formed in all layers of the cortex but preserve the symbolic pattern regardless of the site of origin. In the upper layers the pattern is rich in logically associated elements (ideas, events, etc.). In the deep layers autonomous complexes and subconscious desires may come into play.

According to the degree of deviation from coherent thinking characteristic of the wakeful state, hypnagogic dreams may be divided into three groups:

- 1) Images which on the whole remain in the realm of coherent thought but here and there show signs of dissociation of ideas.
- 2) Fantasies suggestive of day-dreaming (shifts, substitutions, distortions, on a relatively high level.)
- 3) Dreams or fantasies as defined above, but supplemented by excitation of the sensory nerve centers (voices, sensations, etc.).

Analysis of hypnagogic images is the more difficult the greater the deviation from the normal wakeful state. Those in the third group can seldom be given a decisive interpretation.

Psychoanalyzing these symbolic illusions will undoubtedly help also in understanding the protective symbolism of hallucinations which appear in various pathologic conditions (psychotic states).

Neuropsychiatric Problems of the Flyer. *R. C. Anderson, Topeka, Kansas. Am. J. Med. 4:637-44, May 1948.*

A description is presented of the psychiatric ills to which the flyer is subject. The best treatment of these reactions is prophylaxis. In war this is vastly more difficult than in peace. All flyers should be assured of adequate rest and relief from flying duties so that they do not become "stale." Early symptoms of impending neurotic disorders and psychosomatic disturbances must be promptly recognized, their basic origin determined and appropriate psychotherapy begun before irreversible behavior patterns are established. The intelligent management of the neurotic flyer is the same as that of all other neurotics. It follows that the procedures of mental hygiene are also the same. It is an old fallacy to suppose that all neurotic disorders might be prevented in flyers and others by proper selection of personnel. The experience of the war has shown this not to be true. This is because even the most stable and well adjusted personalities do not represent perfection. Consequently there is always a weak spot in the personality armor which may succumb only to a specific stress to which it is sensitive. It is impossible to predict whether or not the individual will be exposed to the specific stress he cannot tolerate. In some of course the weak spot is large, while in others it is small. So-called predisposition is important, therefore, in a quantitative sense but to a considerable degree all individuals are predisposed. Another fallacy exploded by the war is that the known neurotic cannot fly successfully. A study made of 150 successful combat pilots showed that 50 per cent had histories of pre-existing instabilities sufficient to be considered evidence of neuroticism by most standards. In many cases flying itself may afford the individual relief from his basic conflicts and an outlet for his basic anxieties. This is not meant to imply that neuroticism is a favorable characteristic. Other things being equal, the efficiency of the non-neurotic is likely to be greater than is that of the man who starts any activity with a neurosis already established. 5 references.

A Statistical Study of First Admissions with Involutional Psychoses To Hospitals For Mental Disease In New York State. *Benjamin Malzberg, Ph.D., Bureau of Statistics, Albany, N.Y. Psychiat. Q. Suppl. 22:141-55, Pt. 1, 1948.*

The prevalence of upward trends of first-admissions with involutional psychoses has been especially marked since 1930. This group is now exceeded in frequency of admissions only by first admissions with dementia

praecox, psychoses with cerebral arteriosclerosis, and senile psychoses. The involutional psychoses are at their maximum prevalence in the fifth and sixth decades of life. The average age at first admission with these disorders is higher among males than females. The relative rates of first admission are higher among females than males in ratios of from 2 or 3 to 1. Subnormal intelligence occurs in a relatively low percentage in the involutional group. This group has the same distribution of education levels as the general population. It has low percentages with high school or college education as compared with first admissions with manic-depressive psychoses, or dementia praecox. The involutional group showed high percentages with paranoid characteristics and anxiety traits. First admissions with involutional psychoses seem to come from higher economic levels than the general average of first admissions. The involutional disorders appear to be more prevalent among the unmarried than the married. The rural population had a lower rate of first admissions with involutional psychoses than the urban population. This was owing to a very low rate among the farm population. The percentage of intemperate drinkers was low among the involutional group. Negroes contributed slightly less than their quota with involutional psychoses, whites slightly more than their quota, but the difference is not significant. Foreign whites had a higher rate than native whites, and foreign whites born in Russia and Poland had rates in excess of their quotas. However, such rates cannot be compared directly in view of the absence of necessary data with respect to age distributions.

Attempted Suicide: A Ten Year Survey. *Jack V. Wallinga, Cleveland, Ohio.* Dis. Nerv. Syst. 10:15-20, January 1949.

In the group of 381 suicidal patients observed in a general hospital, who were the subject of this study, domestic and family difficulties were found to be the major precipitating cause for suicidal attempts, with economic and financial worries, and ill health frequently found in males as motives also. Alcoholism was found in over half the men and nearly a third of the females. A quarter of the male suicidal patients gave a previous history of chronic alcoholism. It would appear that an underlying personality disturbance which finally was brought to medical attention through an attempt at self-destruction had been previously evidenced for a prolonged length of time by the refuge in alcohol. It was found that the more dramatic and relatively harmless methods are resorted to in the suicidal attempt more frequently by women, whereas males were found to use the more brutal and effective methods. One sixth of the persons in this study had a record of a total of 105 previous attempts at suicide, and one fourth of the patients were found to have a previous diagnosis of mental illness, 39 of these having been considered psychotic. No subjective symptoms were found consistently enough to be considered of prognostic value in potentially suicidal patients, and as yet it is not possible to differentiate between suicidal gestures and genuine suicidal attempts. Of the whole group, 44 per cent of the cases

were given a final psychiatric diagnosis, and over half of these were considered psychotic. However, suicidal trends appear to be more an indication of an emotional disturbance than a desire actually to do away with oneself, since the great majority of these cases used innocuous materials and did not greatly endanger their lives, while those few who were evidently more sincere in their efforts toward self-destruction were able to end their lives quite efficiently. 12 references, 3 tables.

Neuropsychiatric Screening of a Million Men. *Elbert C. Reitzel (Capt., MC, U.S.N.R.), Vernon L. Miller (Comdr. H(S) U.S.N.R.), George W. Knox (Lt. Comdr. H(S) U.S.N.R.)*. U.S. Navy M. Bull. 48:555-65, July-August 1948.

As a result of the considerable debate concerning the percentage of recruits which should be discharged from the naval neuropsychiatric clinics of the training centers, a survey was made of the neuropsychiatric discharges out of over a million recruits examined in approximately a five-year period at the world's largest naval training station, throughout the war and early postwar periods. The discharge of a certain number of recruits is not the fundamental objective of the neuropsychiatric clinic. The fundamental objective is to discharge only those who would be more of a detriment than an asset and to retain those who will be more of an asset than a detriment. With this objective, a fluctuation in the percentage discharged is expected with a variation in the quality of incoming recruits. This variation in the quality of recruits was determined by many changing conditions throughout the war and postwar periods.

Some factors which determined the fluctuation in the quality of recruits, and consequently, in the percentage discharged, are pointed out. Personality disorder (inability to make an adequate social adjustment) is the outstanding reason for discharge. Although a mental defective diagnosis was given to only 5 percent of the cases, this condition in milder form contributed to the decision of unsuitability for many cases otherwise classified, especially of the personality disorders. Twenty percent of all discharges were below normal intelligence, 15 percent falling within the I.Q. range of 70 to 90 and 5 percent being below 70. Seventeen percent of all discharges exhibited symptoms suggestive of organic involvements, although electroencephalographic examinations revealed that only 7 percent actually had such involvements. Ten percent of all these cases had functional disorders which simulated symptoms of organic conditions.

Remarks on Training for Psychotherapy. *S. A. Szurek, University of California Medical School and the Langley Porter Clinic, San Francisco, Calif.* Am J. Orthopsychiat. 19:36-51, January 1949.

Training for psychotherapy is discussed especially with reference to the reduction of the neuroticisms of the candidate. Skill in psychotherapy cannot be separated from the general personality organization and the actual

self-attitudes of the psychotherapist, so that the problems of supervision may be considered as an extension of, and essentially similar to, the process of psychotherapy itself. Among other distinguishable attitudes in his therapy, a psychiatric patient needs to experience such qualities of feeling from his therapist as the following: patient indulgence for present helplessness, for intercurrent regressive needs, or for biologically determined impulses of his body; calm, self-respecting, nonretaliatory firmness in regard to his hostile impulses and "fraudulent attitudes"; honesty with respect to the actual feelings of *both* the patient *and* the therapist; and a timeless kind of tolerance for the time required to acquire integration as well as an unyielding optimism throughout that persistence in the work will eventually lead to the solution of problems and dilemmas. It is maintained that no would-be therapist can behave in these ways toward a patient unless he has already sufficiently integrated exactly these qualities into his self-attitudes. And it is held also that no one does integrate such attitudes into his self-organization unless he has experienced them for a sufficiently long time at the hands of others in the critical years of childhood or correctively later on in his life. In addition to such suggestions as the supervisor may give the trainee as to the complex of attitudes his patient reveals in his behavior during the sessions, there is much more need to help the trainee to be able to empathize with his patient. Just as the patient is encouraged to full, frank verbal expression, so likewise should the trainee be. He should be invited not only to express his own intuitive impressions of the patient's behavior, but also any view or opinion of it which is divergent from that of the supervisor. The supervisor in this way is able to afford the trainee an opportunity to experience the supervisor's capacity to tolerate such differences of opinion. 14 references.

The G. E. Rennie Memorial Lecture: Organic Nervous Disease And Mental Mechanisms. *Leonard B. Cox, Melbourne*. Proc. Roy. Australas. Coll. Phys. 3:34-47, January 1948.

An attempt is made, mainly by the simple correlation of clinical fact with pathological findings, to set forth some aspects of the mind-body relationship. The discussion undertakes (i) to distinguish a mechanism whereby sleep is promoted; (ii) to show that its disturbance by organic disease may produce or be associated with derangements of the mind analogous to psychogenic disorders; (iii) to consider the anatomical basis of consciousness, and in particular the contribution to this of the prefrontal area. It is suggested that there is a mechanism which controls the sleep-waking state and that in its disorder by organic disease mental states resembling the psychoses may occur. Further, it is believed that this mechanism may act by various channels on the various parts of the brain whose activity underlies the conscious state and thus produce the variety in the changes observed. The role of the prefrontal association areas is perhaps best described in a general way. It would seem as if they act as "resonators" to the emotions

and possibly to some more than others. They may indeed through them affect the intellect. Without the frontal poles emotional response may be sudden and violent but often not sustained. In their presence, however, some emotions seem to reverberate and continue to do so once the emotional response has been inaugurated. This of course could be of value in normal life, for by this means intellect and imagination may be kept under excitement until the goal has been obtained. But in the life of the mentally diseased the tense emotional state can persist without interruption. And there may be other areas with similar "resonator" functions, for all the other lobes may participate. It is emphasized that in the conscious state much of the brain may be in a condition of activity. 19 references, 6 figures.

Lange-Eichbaum, Wilhelm; *Nietzsche, Krankheit und Wirkung*; ed. 3, 1948, Verlaganton Lettenbauer, Hamburg.

### 5. Geriatrics

Old Age From The Psychiatric Viewpoint. A. B. Stokes, M. B., Toronto, Ont. Canad. M.A.J. 59:518-21, December 1948.

Both from the point of view of prevention and treatment of psychiatric disorders in the aged, the psychiatrist's interest must range from the pathophysiological, through the psychophysiological, to the social. At each he will come up clearly against the problem as to whether he is observing a morbid process with varying possibilities of modification or an inescapable consequence of a natural involution. Pathophysiological studies of the aging human organisms, while considerable, fall short of general practical application so far as the psychiatrist is concerned. There is much evidence of impoverishment of cerebral physiological activity in the aged. The increasing differentiation of the pathological processes responsible for dementia in the senium and presenium offers the hope of a working classification based on a clinico-etiological foundation. Psychometric testing has been widely carried out on the aged and the reported results have been much criticized. Although the general result is in favor of the concept of an inescapable involution it may be that there are at work possibilities in the aged hitherto unsuspected. Perhaps the greatest practical contribution which would come from closer clinical observation, apart from a clearing-up of confused nomenclology, is the grading of capacity to live within the sheltered existence of the mental hospital. Where capacity exists it should be fostered by an effort appropriate to its worth; where it is non-existent the expenditure of expert services might well be cut out and replaced by a properly humane but medically inexpert care. Unmodifiable senility with complete incapacity for mental life should not be a burden on the valuable time of a highly qualified staff of doctors and psychiatric ancillaries. 16 references.

The Neurotic Struggle In Senescence. T. A. Watters, *De Paul Sanitarium, New Orleans, La. Geriatrics*. 3:301-5. September-October 1948.

Three cases of a neurotic struggle persisting into senescence are reviewed. It is shown that the neurotic factors at work are subject to some modification when recognized and properly treated, regardless of the patient's age. The physician can induce the patient to accept inevitable changes in the physiological rhythms of digestion, elimination, sleep, etc., and will go into the problem of aging with the relatives, particularly as applied to the patient, pointing out that such traits as hoarding, hiding, forgetting, and undue suspicion are part of the picture, and are to be accepted philosophically, yet dealt with practically. Occasionally, the doctor can intervene to encourage children accustomed to life-long domination by the aging parent, to take over some authority and not permit the whims and caprices of the senile tyrant to disrupt the household. Such careful study of these family units in operation will reveal quite frequently that what is often falsely ascribed to heredity is really a conditioning of the individual to his family pattern, such conditioning operating by identification or imitation, or by rebellion and opposition. The pattern itself may be either desirable or undesirable; in any event it must be considered a force to be reckoned with, for often unconscious tendencies impel repetition over successive generations, and it is charged too quickly to heredity. On the other hand, if corrections or compensations are made, heredity is not given proper credit for the successes, for even "bad" heredity may be considered "good" in a sense, if it is stimulative of the extra effort needed for such corrections. This paradox can occur often enough to constitute a therapeutic resource rather than a liability, with proper manipulation of certain unconscious determinants.

## 6. Heredity, Eugenics and Constitution

Constitutional Factors in Neurosis (*Konstitutionsmedizinischer Beitrag zum Neurosisproblem*). W. Blumencron, *Gratz, Austria*. Wein, *Zschr. Nervenhe.* 1: No. 4, 329-57, 1948.

The direct cause of neurosis is lowered vitality. The proper sleep-growth balance is labile or displaced, and the same is true of the conscious drive for the fulfillment of primary urges. This is due to constitutional weakness of the pituitary-mesencephalon system; which means, above all, impairment of the vegetative nerve centers, hence poor control of the tonus and reflexes as well as excessive variability of muscle tone, blood pressure, neurologic responses, etc. Secondary damage involves deficient circulation, especially in the cortex, besides poor balance and partial dysfunction of the endocrine glands, which through deficiency or excess of hormone disrupts the associative and emotional processes in the cortex. Pituitary disturbances further displace the endocrine equilibrium. In addition, they either reduce

or increase the rate of growth, causing hypo- and hyperplasia, disharmony of physical characteristics, etc. The hormone deficiency affects indirectly both the central and peripheral vegetative system.

The weakening of the pituitary-mesencephalon may be due to: 1) Congenital debility, displayed already in the embryo, including malformation of the sella turcica. 2) Congenital infectious intoxication of an essentially normal structure, resulting in poor embryonal development. 3) Congenital debility of the mesoderm affecting the circulatory system in the embryo, especially the blood vessels. Malformation and weak walls in larger vessels are important, but the most drastic changes in brain development or in postnatal functioning occur when the capillary network is poorly ramified, or the wall permeability abnormal. Such defects lead to brain anemia, malnutrition and anoxemia, hence acidosis in the brain tissues.

The integrated (B) personality (after classification by Jaensch) is inclined to hyperfunction of the thyroid. With pituitary-mesencephalon disorders superimposed, anxiety neurosis (phobias) are likely to develop, as in Basedow's disease. The mental and physical processes being well coordinated, psychoneurosis is a common complication. However, the extrovert traits make for favorable prognosis (successful psychotherapy).

The disintegrated (T) type shows a tendency toward tetany. Here pathology of the pituitary-mesencephalon leads more often to compulsion neurosis or the vague type of anxiety. Dissociation of the psyche from the physical side prevents psychotic complications, but psychotherapy seldom succeeds, due to introversion. Drugs are more effective, since they aim directly at the vegetative centers and, by raising vitality, improve the emotional state. Extensive bibliography.

## 7. Industrial Psychiatry

*The Nervous Woman In Industry. Kenneth D. Gardner, San Francisco Calif. California Med. 69:422-24, December 1948.*

In an attempt to find the underlying causes of nervousness of women in industry (the nervous woman being defined as one who finds her general well-being impaired because of a state of tension produced by inability to cope satisfactorily with certain conditions or circumstances), the medical department of a large industrial concern analyzed histories of 25 nervous women over a three-month period. Nearly every patient presented two, if not all three of the main complaints—nervousness, insomnia, weeping. Six of the patients were in the 15-25 age bracket, 4 were between 25 and 35, 9 between 35 and 45, and 6 between 45 and 55. No one in the present series found the physiological menopause a primary major upsetting factor. A very important group of these women were classified as "anti-socials;" four were classified in the so-called "exhausted state" group; two were disappointed in love; four were homesick; four were not adjusted to their work; and four

had active organic disease which either played a major role in the maladjustment or confused the picture. In older people, and particularly in the "anti-social" group, the condition often is irreversible. It is concluded that the "nervous women" in industry usually is maladjusted. Questioning by a physician will often elicit the underlying cause. Sound advice then may restore to fuller usefulness the unhappy person who is a poor worker, a chronic complainer, and a drain on sickness insurance.

Compensation For Psychiatric Disabilities In Industry. *Carl A. Whitaker, Emory University School of Medicine, Atlanta, Ga. Occup. Med.* 5:391-5, April 1948.

The problem of compensation for psychiatric disabilities whose cause or aggravation is directly related to accidental occupational injuries is discussed. The chief principle laid down is that, if the primary factor in the "break" is the predisposition, the disability is not considered compensable; but if the primary factor is the stress, it is recommended that the employer assume liability. The grading of the predisposition is considered to be the province of a consultant psychiatrist. The grading of stress is accomplished by the psychiatrist and the physician responsible for the medical service at the plant. Predisposition to an emotional break resulting in a psychiatric disability is usually determined while the disability is still present and is based on the evaluation of three points: (1) the type of personality; (2) the history of previous emotional stability; and (3) the reaction to the interview situation. In certain cases it is necessary for the sake of a sound estimate to know the patient's response to therapeutic effort. In deciding whether the stress is mild, moderate or severe, one must consider in detail the circumstances associated with the accident, and this is best accomplished by the plant physician together with the psychiatrist. Four cases are cited to illustrate this method for the determination of liability in cases of psychiatric disability.

## 8. Psychiatry of Childhood

Preadolescent Schizophrenia (*Schizophrenie im Kindesalter*). *M. Tram-er. Aertzl. Mhefte* 4: No. 4, 307-16, 1948.

Most children during prepuberty (ten to thirteen) exhibit certain schizoid trends, which they soon outgrow. Some, however, suffer a breakdown, either during this time (50 per cent of such cases—usually those who had earlier shown prepsychotic traits) or later, at puberty, or during another crucial period of transition. Both the hypo- and hyper type are equally susceptible, yet preadolescent schizophrenia is rare (1 to 4 per cent of all mental patients).

The onset may be acute or subacute, the progress slow and gradual, or else the condition progresses in a series of intermittent attacks of varying

intensity. The inconspicuous (hebephrenic) forms tend toward dementia, the acute cases often end in a pseudocatatonic state. A pseudoneurotic form is also known (compulsions, phobias, etc.). The paranoid type is rare, since the interest in the ego is not conscious enough and the thought-processes not fully developed.

Progressive disintegration starts with the relationship to the environment, particularly to other people. As normal contacts deteriorate, substitute bonds may develop (exaggerated love of nature, attachment to animals or objects), or a compensatory antagonism which is eventually transferred from the immediate surroundings to the world in general. A tendency toward isolation alternates characteristically with attempts to reestablish normal relations. Day-dreaming, negativism, depressive moods, are also typical. Narcissism may be restricted to masturbation, or lead to paragenital manifestations (body rocking, kissing, etc.).

Next come anxiety symptoms and queer behavior patterns. Vegetative disorders are possible (akineses, hypo- or hyperkineses) but catatonia seldom develops. Mutism, phonographism (as a release of mutism: Tramer) and other speech impediments are followed by thought dissociation, including real dementia.

Most patients are aware of being 'different' from other children, hence a feeling of not belonging, jealousy, loss of purposeful orientation, often aggravate the condition.

Remission, complete or partial, is spontaneous, but, as a rule, prognosis is unfavorable. Etiologically, the preadolescent development is disrupted through impairment of the endocrine balance, or in some other way, not yet known. Early diagnosis is difficult, but differentiating from infectious mental disorders, organic lesions in the brain, etc., is quite possible.

Institutional treatment is not advisable at present, since children are kept together with adults and are subject to the same routine. Home care, special education and play therapy are important. Prophylactically, proper choice of playmates and study of family histories cannot yet be carried out on a social scale. However, the family physician may help greatly in alleviating the problem.

Emotional Barriers in the Understanding and Treatment of Young Children. *Betha Bornstein, New York, N. Y. Am. J. Orthopsychiat.* 18:691-97, October 1948.

An outline is presented of those emotional problems in regard to the child, his parents and the analyst which endanger objective understanding. In addition to the limitations caused by the child's nature, are those which derive from the impact of the child's treatment on the dynamic equilibrium of the family. It is known that in the analysis of the child patient the parents play a unique role and are uniquely affected. For example, there is the narcissistic injury which the child's analysis entails for most parents.

Such parental attitudes, which might threaten the analysis of the child, must be counteracted by the analyst. This necessitates his regular contact with the parents, and his understanding of and tolerance for their problems. His contact with the parents should not go beyond such mild and supportive psychotherapy. One aspect of the analyst's attitude to the child in analysis is stressed, namely, fear of the child. Children throughout the ages have been considered a threat by their parents and society in general, and it is not surprising to find traces of this tendency in the analyst's relationship to children. The difference in the attitude of the analyst toward a juvenile and an adult neurosis reveals a diluted derivature of the archaic superiority-inferiority attitude toward the child. A further limitation is that stemming from the nature of child analysis itself. The structure of the child's personality has been misunderstood and the tendency has been to oversimplify it. The expectation was that the child would offer a simple basic phenomenon from which the evolution of later adult complexities could be genetically derived. Whereas the analyst's insight into his own personality structure can counteract the detrimental effect of most of the irrational attitudes toward children, the emotional configurations in regard to the period of childhood cannot be dissolved; it can, however, be mitigated by a thorough knowledge of developmental psychology. A serious complication in terms of the analyst's mental hygiene is the danger of regression, which no one in continuous contact with children can escape. The defenses the analyst unconsciously brings into play against this may block his intuition.

Psychosomatic Disease of Children. (*Psykosomatiska sjukdomar hos barn.*) S. Gunnarson, Stockholm, Sweden. Nord. med. 38: 937-41, No. 19, May 7, 1948.

At the Kronprinsessin Lovisa Children's Hospital in Stockholm, Sweden, the psychosomatic study of children was initiated about a year ago. Statistics are not attempted in this report, since the time has been short; promising results have however already been achieved. Special attention is being allotted to the psychosomatic and psychiatric treatment of children with asthmatic and intestinal symptoms and a brief case history of each of these conditions is given.

Severe and frequent attacks of asthma were present in a 12 year old boy who was known to be allergic to fish. Further study disclosed the presence of a "psychic allergen" in the guise of an elderly, unmarried, dominating and emotionally cold aunt with whom the boy had been living after the break up of his home. Legal action put him in charge of his maternal grandmother, of whom he seemed to be fond. His attacks ceased immediately and he has remained well since.

The severe ulcerative colitis, with constant diarrhea, in a 7 year old girl became constantly worse under the usual medical management for the first three months in the hospital. The child was encouraged to play with dolls and her reactions recorded. By this means it was determined that she missed

the affection of her mother, who was a professional woman and away from home a great deal. This form of play-therapy also improved the patient psychically. The mother was brought in and under her cooperation the child's bowel condition became normal in a fortnight; she gained weight and could be discharged from the hospital. Ten months later child still exhibited perfect emotional and somatic balance.

What Is A Moron? Edgar A. Doll, *The Training School at Vineland, N.J.* J. Abn. & Soc. Psychol. 43:495-501, October 1948.

The social and intellectual moron are distinguished, and three criteria of what constitutes a moron are discussed, namely (1) social incompetence owing (2) to a low degree of intelligence as a result of (3) incomplete development. The Vineland Social Maturity Scale now affords a systematic instrument for measuring social incompetence at all ages from birth to maturity and of expressing such incompetence in quantitative terms. With this scale it is possible to determine with some assurance the *ad hoc* degrees of social performances which are necessary for social independence, and it is possible clearly to set apart persons of widely different social competence, although of the same intellectual competence. Further, the field of psychological measurement offers at present many standard devices for the measurement of special aptitudes, of interests, of achievement and personality. When these devices are employed as a battery, the feeble-minded or social morons are rather clearly distinguished by serious *general* retardation, whereas the so-called intellectual morons are distinguished by their *specific* handicap in the verbal and literate types of tests. The third criterion of feeble-mindedness, arrested development, is relatively simple in concept but tricky in proof. The specific causes of mental deficiency appear to be associated with the course of delayed development, the familiar instances tending toward delayed retardation (late final arrest), the clinical types toward early arrest, and the accidentally impaired toward slow but incomplete recovery. Such etiological diagnoses as endogenous or exogenous are specially necessary for sound prognosis, guidance, therapy and research. It is obvious that research in the field of mental deficiency cannot rise above the inadequacy of the diagnosis and the etiological classification system employed. If therefore a research study of the character of the moron should deal in one instance with social morons (feeble-minded) and in another instance with intellectual morons (who are essentially normal but dull) we should not obtain comparable results and may obtain false or misleading results. Similarly, if in a given study the subjects of the investigation reflect indiscriminate grouping of endogenous with exogenous morons, we shall again obtain results of confusing significance. Likewise, unless we distinguish social morons from intellectual morons we shall be at odds on the comparative merits of the welfare programs advocated for their social control. 29 references.

## 9. Psychiatry and General Medicine

Psychological Phenomena In Cardiac Patients. *Carl Binger, Cornell University Medical College. Bull. N.Y. Acad. Med. 24:687-701, November 1948.*

Some of the psychological phenomena seen in cardiac patients are discussed, especially with reference to three age groups: (1) children and young people who suffer from various forms of rheumatic heart disease; (2) people of early and middle age who suffer from so-called "cardiac neuroses"; (3) people of middle and late middle life who suffer from coronary insufficiency and coronary occlusion. Anxiety is the most important psychological manifestation in cardiac patients. In the first group it is more to be reckoned with in the parent than in the sick person. In the next group anxiety is of cardinal importance in the patient himself and in the formation of his symptoms. Usually in the "cardiac neuroses" it is necessary to differentiate between hypochondriasis, anxiety neuroses, and organ neuroses, and sometimes hysteria, in its technical, not its popular sense. None is necessarily exclusive of the other but the indications for treatment depend upon the weighing of these various components. In all of them anxiety plays the predominant dynamic role. The anxiety is not entirely equivalent to fear and legitimate worry, but is a complicated emotional state in which hostility or rage as a defense against fear is also mobilized. The psychiatrist must make up his mind whether to explore and uncover the deeper sources of anxiety or whether to help his patient cover them up and let healing occur by repression. The choice will depend upon the age, adaptability, intelligence and strength of character of the patient and on his capacity and willingness to relinquish symptoms. In the older age groups effective psychotherapy is by no means ruled out, but it is often difficult, especially in the presence of extensive cerebral arteriosclerosis. Although these patients have outspoken structural damage to their hearts, it would be a mistake to conclude that emotional influences play no role in their illness or in their recovery. There is no better psychotherapy for the cardiac invalid than to be permitted and encouraged to exercise when such advice is compatible with his cardiac reserve. 11 references.

Treatment in a Psychosomatic Clinic. Preliminary Report. *Herbert S. Ripley, Stewart Wolf and Harold G. Wolff, New York Hospital, New York, N. Y. J. A. M. A. 138:949-51, Nov. 27, 1948.*

The present report is based on experiments and treatment with 889 patients with bodily disturbances and with emotional reactions occurring as part of a response to adverse life situations. 690 of them were followed up for more than a year. The designation, symptomatic improvement, was applied to those who had shown a definite and sustained diminution in signs and symptoms over a period of at least a year. Basic improvement depended

on the symptomatically improved persons having encountered a major threat in their life situation and having shown a reorientation of outlook by meeting it in a more constructive way and without symptoms. Of the 690 patients, 113 were considered to be symptomatically and basically improved, 234 were considered only symptomatically improved, and 343 unimproved. 191 of the 343 patients attended the clinic for less than a month, and of these, 82 received no treatment. If those who received no treatment were excluded, 19% were basically improved, 38% were symptomatically improved, and 43% were unimproved.

The chief procedure and the number of cases in which they were used successfully as follows:

Reassurance and emotional support	300
Free expression of conflicts and feelings	304
Advice regarding attitudes, habits and activities	173
Explanation of psychophysiologic processes	140
Symptomatic drug therapy	123
Intravenous use of "sodium amytal" (sodium isoamylethylbarbiturate)	112
Ruling out neoplastic and infectious disease	112
Dealing with other members of the family	101
Development of insight	99
Analysis of emotional development	91
Attempts to modify situation	71
Dream analysis	52
Help from Social Service Department	39

Reassurance and emotional support employed the human warmth of the physician and was helpful in enhancing the strength, faith and determination of the patients as well as in releasing inhibitions and repressions. The physician attempted to play the role of a strong, authoritative, but not authoritarian, thoroughly dependable friend of the patient. Free expression of conflicts and feelings through verbalization promoted a release of tension and often resulted in relief from anxiety and resentment and less need to act out emotional conflicts in a socially undesirable manner.

Analysis of the emotional development during infancy, childhood and adult life was elicited by a biographic review and by allowing the patient to associate freely about significant life events and his reactions to them.

The recording and measurement of physiologic disturbances and correlating them with the emotional reactions and behavior of the patient in varying life situations served to promote an understanding of the total biologic response and was especially helpful to those who came to the clinic perplexed about the nature of their disorder or apprehensive of its being a serious or perhaps fatal disease.

Recall and interpretation of dreams facilitated uncovering of emotional conflicts, the feeling of security engendered and the release of emotional repression aided in establishing healthier patterns of bodily function and in the development of more mature attitudes and behavior.

An average of 9 hours per patient was spent and no patient received more than 85 hours of clinic time during the 2 years of follow-up.

The following assets presaged improvement :

1. Recognition of failure of present patterns of adjustment and desire for help.
2. Confidence in and ability to cooperate with physician.
3. Flexibility of personality structure.
4. Disorder of recent origin.
5. Capacity and willingness to assume responsibility in treatment.
6. Past record of constructive interpersonal relationships.
7. Past record of ability to derive satisfaction from occupation, religion, sports, lodges and other activities.
8. Willingness of family to cooperate.

The depth of treatment obtained depended on the ability of the patient to use his resources in developing improved patterns of reaction rather than on the frequency of the interviews or the duration of the treatment.

In conclusion, it has been possible satisfactorily to treat in a medical out-patient department patients with various psychosomatic disorders and effect fundamental improvement in one out of 5 and at least symptomatic improvement in more than half of the group treated. 5 references.—*Author's abstract.*

Psychiatric Liaison Work: A Twelve Year Survey. *Harriot Hunter, Colorado Psychiatric Hospital, Denver, Colorado.* J. Assn. Am. Coll. 23:305-12, September 1948.

The work of the Psychiatric Liaison Department, established in 1934 at the Colorado General Hospital, is described. The advantage of such a department are first that of geographical location which makes it more convenient for the medical and psychiatric staffs to keep in close contact with each other; second, the stigma which is apparently attached to transfer to the "Psycho" ward or hospital is dispensed with; third, standards of treatment in general are raised by the collaboration of the psychiatric and medical staffs; fourth, there is ample evidence that in the long run there is considerable financial saving in the hospital with such a service. During the first five years of the Colorado Department's existence the improvement in psychiatric consultation and treatment facilities resulted in cutting the average patient stay among the psychiatric patients in the hospital from approximately 28 day to 15 days, the average stay of the non-psychiatric patient. There was a corresponding drop in the number of unnecessary

laboratory and diagnostic procedures, such as bone x-rays and G.I. series, which were previously much more frequently employed in the case of the psychiatric or "psychosomatic" patient. Finally, over a period of years, the number and percentage of patients transferred to the psychopathic hospital has slowly and consistently decreased as compared with the number of patients admitted to the general and psychopathic hospitals. This indicates that since the establishment of the liaison department, the general hospital staff has become more willing and able to handle their own psychiatric cases, and the cases referred are seen earlier in their illness and are thus not candidates for admission. Among the less tangible but no less important advantages is the bringing together of able men of medicine, no matter what fields they represent, and the cooperation and constant working together of both internist and psychiatrist in the same departments offers unlimited advantages to both, not only in the process of learning themselves, but also in the diagnosis, treatment and disposition of the cases seen together. A Psychiatric Liaison Department can also contribute to the community mental hygiene program in the prevention and treatment of personality problems among the personnel of a large university.

### 10. Psychiatric Nursing, Social Work and Mental Hygiene

Opportunities For Mental Hygiene In Public Health. *Paul V. Lemkau, Johns Hopkins University School of Hygiene and Public Health. Am. J. Orthopsychiat. 18:670-78, October 1948.*

Public health departments deal with individuals at all ages, and particularly at some of the most significant and critical periods of personality development. Each of these offers opportunity for mental hygiene work and in some of them the opportunity is beginning to be grasped. Probably nowhere is the opportunity for genuinely prophylactic work being fully grasped. This is partly the fault of public health, partly of its professors who have not sufficiently developed the service and educational technics for public health to use. Too often there is satisfaction with the concept that prophylaxis is sufficiently done when cases are reached early in the course of disease or disorder. This is not really prophylaxis since the person has not been prevented from getting sick, but only from getting "sicker". The great opportunity public health offers is an approach to the problem of doing something about the condition of our people to protect them from becoming sick. The technics for this are relatively unexplored. Methods of evaluation of the work are not satisfactory. It is believed that the only clear issue about the whole idea of the improvement of mental health is that public health procedures now in force offer tremendous opportunities for the work. Public health reaches out to orthopsychiatry for help and guidance in the research problem of how best to utilize what orthopsychiatry has to offer. A brief review is presented of the types of situations in the lives of people that fall within the daily work of health departments as now functioning.

Public Opinions and Information Concerning Mental Health. *Glenn V. Ramsey and Melita Seipp, Princeton University, Princeton, N. J.* J. Clin. Psychol. 4:397-406, October 1948.

Data are presented concerning the nature of the opinions, attitudes and information of 345 people with respect to various aspects of nervous and mental illness. Individual interviews were conducted, and the respondents consisted of a fairly representative group taken from the total population of Trenton, New Jersey. The answers to the causes of insanity were primarily stated in terms of naturalistic rather than mystical or supernatural concepts, although some of the naturalistic explanations were contrary to known facts, or at least very questionable in the light of present-day knowledge. Psychogenic concepts appeared most frequently. Only a very few respondents gave evidence of being able to differentiate between the major and minor forms of mental illness. Symptomatology of mental diseases and environmental forces surrounding the individual were considered to be causes of insanity.

One series of questions sampled attitudes and opinions concerning mental health. The first of these questions pertained to the association of sin and insanity. Among the people interviewed 74 per cent did not believe that insanity came as God's punishment for some sin or wrongdoing, while 20 per cent still adhered to this belief. Regarding the role that inheritance plays in insanity, it was found that about 20 per cent of the respondents felt that insanity was completely ascribable to heredity, whereas about 32 per cent thought that heredity bore no relation to insanity at all. Forty per cent believed that in "some cases" heredity had an influence, and the remaining 6 per cent were uncertain as to its influence. Almost 50 per cent considered that association with the insane might be a cause of insanity, while 25 per cent thought this possible only under certain conditions, and the remainder felt that there was no relationship. Some 50 per cent believed, unqualifiedly or with reservations, that "poor living conditions" might be a contributing factor. Ninety-one per cent believed that something could be done for insane persons, most of them recommending some type of professional care. 2 references.

Religion and Psychiatry. *Frank R. Drake, Denver, Colo.* Am. J. M. Sc. 217:111-16, January 1949.

The author points out the similarities in the goals of religion and psychiatry and reviews the literature to demonstrate how religious leaders and psychiatrists have become increasingly aware of what each field has to offer the other. Examples of team-work among army psychiatrists and chaplains in World War II are presented. There is nothing in the known structure of the psychic apparatus that a true believer and religious thinker cannot accept.

Pertinent notes from the case histories of five patients admitted to Colorado Psychopathic Hospital are discussed to illustrate actual examples of how clergymen and psychiatrists have cooperated, to the benefit of the

patient. The pastor and priest deal entirely with conscious material. The psychiatrist begins with conscious material, but, in addition, attempts to find the unconscious sources of inner conflict. The sixth case illustrates how a parent can be a factor in a son's development of a potentially dangerous type of sexual perversion by threatening the child for showing evidence of normal sexuality. The seventh case exemplifies how an individual's anxieties, feelings of insecurity and resentments can be tragically misunderstood and mishandled by all those responsible for her guidance to emotional maturity. No attempt was made in this review to present an exact division of responsibility of religion and psychiatry for mental hygiene. Such an attempt would be incomplete, as there is obvious overlapping in some areas, and too little definitive research has been done on the subject. 48 references.—*Author's abstract.*

### 11. Psychoanalysis

Anatomical Structure and Superego Development. *Phyllis Greenacre, Cornell University Medical College. Am. J. Orthopsychiat. 18:636-48, October 1948.*

An attempt is made to trace some of the influences of the gross differences in anatomical structure in the two sexes on character and superego development. There is first the obvious fact that the male organs are exposed and external whereas the female organs are almost completely invaginated. With the clitoris, and even more in the case of the vagina, the female child lacks the degree of firmness and consolidation of the combined senses, which is inevitably true in the male child. The male child possesses an awareness of his genitality more clearly, directly and intensely than does the female child. The emotional attachments of the child during the first five years of life are also more complicated for the female than for the male. Further, in girls, owing to configuration of the organs there is some confusion subjectively and intellectually between the female groove and the rectum, and since in the whole process of toilet training unseemly or inappropriate defecation is more sternly condemned than is enuresis, it may be that the female genitality gets a further repressing blow from this source. It may be that these and other differences in genital and excretory functions in the two sexes are correlated with such differences as that girls tend to be concerned with personal relations, boys with causal relations. In the early reactions of the sexes to each other's organs, the first important step for the female is her discovery of the boy's greater gift of a penis, and this reaction of the girl to the boy occurs earlier than that of the boy to the girl. Penis envy arises and the feminine type of castration complex ensues. The castration complex prepares for the oedipal attachment (to father) in girls and decisively destroys comparable attachment (to mother) in boys. The fact that the girl accepts castration as an accomplished fact, and the boy continues to fear it,

appears to exert powerful influences on the character and superego formations in the two sexes. Finally, the skeletal musculature of the body as a whole in the two sexes gives rise to such differences as boys' fear of kinaesthetic catastrophies and girls' fear of social mishaps. Girls are often said to have higher ideals than boys, though less clearly goal-directed and less power driven. This, like other character differences between the sexes, may be influenced in some measure by the fact that the boy has a more intact body image in which all his senses concur, while the girls has a mysterious, partly silent, unseen, and not directly palpable area of which she is dimly but not clearly aware and which stimulates her imagination without much test for reality testing. 37 references.

Depersonalization and the Body Ego With Special Reference to the Genital Representation. *Leo Berman, Boston, Mass.* Psychoanal. Quart. 17:433-52, October 1948.

A case of depersonalization in a man, 22 years old, is reported, and discussed particularly from the point of view of body ego pathology. Body ego disturbances, especially of genital representations, may be of basic importance in the psychogenesis of depersonalization. On the basis of the case reported, it appears that in the development of the body ego, parts of the bodies of objects incorporated early must become a fixed and permanent part of the body ego for development to proceed normally. In the present case the body ego was highly instable because of the exaggerated oral aggressiveness and fears of retaliation. This led to a regression to a very early stage of body ego development, with the need to eject from the body ego the penis, originally father's incorporated penis, which normally would have been permanently incorporated to play its role later in the development of the genital representation of the patient's ego body. The ejection or tossing away of the penis had symptomatic representations in numbness and functional inadequacy. The patient experienced what was left over of his penis as a pebble or, more significantly, a bud. The case demonstrated, to a greater or less degree, all the symptomatology reported in the literature of depersonalization. Genetically and dynamically noteworthy were: (1) fixation at a pregenital (especially oral sadistic) phase of development; (2) relationships among the family (father, mother, brother) were overly sado-masochistic; (3) a series of severe infantile and subsequent psychological traumata; (4) distorted (body) ego development. 30 references.

The Concept of Transference. *William V. Silverberg, New York.* Psychoanal. Q. 17:303-21, July 1948.

The hypothesis is presented that transference, as one instance of the repetition compulsion, is to be regarded as ultimately an attempt to deny the existence of the external world and those forces in it, particularly the human ones, which restrict and frustrate the child in his desire and effort or need

to live solely in accordance with the pleasure principle. Ferenczi formulated a hypothesis, concurred in by Freud, to the effect that infants begin existence in a state of subjectivity, without distinguishing between self and the world external to it, and that this condition produces a sense of omnipotence which is modified with difficulty, through disappointments and failures in the achievement of gratifications, into a more objective appraisal of the world and the individual's relation to it (the sense of reality). In so far, then, as transference represents a persistent attempt to deny the existence of those frustrating and restricting forces which have compelled the transition from the state of infantile omnipotence to the sense of reality, it is an attempt to undo that transition and to traverse it in a reverse direction. In all its variety and multiplicity of manifestation, in all the attitudes and behavior which are its expression, transference may be regarded as the enduring monument of man's profound rebellion against reality and his stubborn persistence in the ways of immaturity. The wounds caused him by his initial clashes with the harshness of reality persist as scars which he tries to undo or at least to conceal, by the rehearsals of transference. The wide prevalence of the dynamism of transference among human beings is a mark of man's immaturity, and it may be expected in ages to come that, as man progressively matures—if he does so—transference will gradually disappear from his psychic repertory.

## 12. Psychologic Methods

The Profession of Psychology As Seen By A Doctor of Medicine. *Alan Gregg, The Rockefeller Foundation.* Am. Psychologist. 3:397-401, September 1948.

The subject of what Medicine and Psychology can offer each other is discussed. The more reflective physician finds the horizon of the psychologist refreshingly wide in its inclusion of man's social relationships and his social character. No less admirable has been the example set by psychologists in one of the general problems of science—the problem of the observer. The psychologist's allowance for the individual observer's reaction time, his inadvertencies, his distractions as a witness, and his flaws of memory are well worth further refinement and spirited insistence. Medicine has much to learn from the psychologist in this matter. Because Psychology takes experience as well as behavior and thinking as its province, it places a valuable emphasis upon narrative as well as descriptive exposition. From Psychology, Medicine could learn that statistical analysis offers the only scientific correction of variables that mislead the naive suggestibility of the naive observer. Apart from clinical psychology, Medicine will profit by the changes Psychology can bring in medical education, that extraordinarily intimate blend of acquiring knowledge by experience as well as by the written and spoken word.

From the side of medicine the attention especially of social psychologists is called to the heuristic value of the act of prognosis. Like betting prognosis does not control the event, but it does increase one's interest in all that enters into the final outcome. Clinical experience and responsibility create a unique and ineradicable imprint that deserves the psychologist's attention. Whatever its future may be, Psychology will sooner or later have to face the responsibility that comes from power. Both fields must admit to a common and general fault: both Medicine and Psychology should accept their share of the besetting sin of the scientific mind, namely that it believes that the equation it writes to represent reality contains all the factors that are involved.

A Comparative Evaluation of the Bellevue-Wechsler Mental Deterioration Index Distributions of Allen's Brain Injured Patients and of Normal Subjects. *Robert R. Blake and Billy S. McCarty, University of Texas. J. Clin. Psychol. 4:415-18, October 1948.*

Mental Deterioration Index Scores for the 50 brain injured patients reported by Allen were compared with similar scores for 50 normal subjects for the purpose of testing the empirical efficiency of the Wechsler Index in distinguishing normal subjects from ones who cannot be classified as normal. A consistent and statistically significant trend was found in which normal subjects tend to make low MDI's, while brain injured patients tend to make higher ones, though exceptions to this general trend were noted and commented on. Based on the 100 subjects involved in this study, 74 subjects would be classified correctly, while 26 classifications would be incorrectly classified if the critical score were set at 10. On the other hand, chance would result in 50 being classified correctly and 50 incorrectly. The  $\chi^2$  test for the discrepancy between the actual differences and differences that might be expected if chance alone were operating is 23.04, a value significant far beyond the one per cent level of confidence, and one which indicates that the MDI yields results of real value. Allen's proposed index was tested on these particular normal subjects and found to yield greater error in classifying them than resulted from using Wechsler's MDI. In this sense, therefore, it appears to be no more desirable than Wechsler's. To evaluate it completely, however, it would be necessary to test its efficiency with a different group of brain injured patients, and compare the results with comparable ones for the Wechsler Index. It is emphasized that the present report is concerned with a quantitative evaluation of the MDI when used under conditions in which subjects have been preselected according to conditions, it appears to yield promising results. 6 references, 3 tables. to established criteria and independent of the test itself. Under these

Projective Techniques In Clinical Practice. *David M. Levy, New York City. Am. J. Orthopsychiat. 19:140-44, January 1949.*

Certain experiments, now called projective technics, that are part and parcel of the therapeutic situation, are discussed. Examples are cited to illustrate three different varieties of projective technics—a control situation, fictitious dream construction, and graphic associations. The control situation selected deals with the child's response to sex difference in regard to the genitalia. It was used originally in cases of castration fears in boys and problems of masculinity in girls. Two identical rubber dolls are used, the child being first told that they are the same. Then a clay penis is put in position on the boy doll, and are placed facing each other, and the child is asked (in the case of a boy), What happens? In certain cases in order to get at the meaning of the particular symbols (especially in regard to sexual activities) that a child has used in dreams or drawings or play, the author has asked children to make up a drawing—for example, of the sex organ—and then said, "Now make up as many drawing as you can with the same idea in it. Just anything with that idea in it." It has been found that the fictitious dream constructions are especially interesting. The author originally used it to test his interpretation of the dream by having the child construct a dream, for example, out of his idea of birth if that were his interpretation. Later on he utilized the dream constructions as another means of investigating symbol formation in general. From a therapeutic point of view the control situations appear to be of more value than the fictitious dreams and graphic associations. The sibling rivalry situations represent a fruitful source for the study of aggression and hostility. The genital difference situation has special value in the study of castration anxiety, penis envy, and also sex identification. The graphic associations are especially useful, particularly in the study of phallic symbols. The fictitious dream constructions apply to a smaller number of children than the others.

The Rorschach and Wartegg Tests in Psychoses Treated by Electric Shocks (*Psychologische Untersuchungen mit Rorschach-Wartegg-Versuch an Psychosen in der Elektroschockbehandlung*). *T. Kohlmann, University of Vienna, Austria. Wien. Zschr. Nervenh. 1: No. 4, 382-414, 1948.*

Tests applied before and/or after the shocks as well as four to eight weeks after discharge, gave the following indications: 1) Affectation reduced in schizophrenics (20) and manics (3), increased in depressives (7). 2) Intelligence lowered. 3) Dementive symptoms (perseveration and stereotypy) more pronounced. 4) Activity lowered. Return to preshock personality pattern was slowest in schizophrenics (over six months). Perseveration went back to previous level, but not stereotypy. The two tests showed high correlation. 16 ref., 14 diagr., 7 photos.

The Results of a Hundred Psycho-Diagnoses with the Rorschach Test in Delinquents. (*Resultados de cem psychodiagnósticos de Rorschach aplicados em delinquentes.*). Galdino Loreto and Salustiano Gomes Lins, Pernambuco, Brazil. *Neurobiologia* 11:202-220, No. 3, September 1948.

The lower percentage of coarctated cases and the greater percentage of extra-tensives are noted in this material as compared with the results of Cerqueira on the normal and of Serebrinsky on homicides.

### 13. Psychopathology

Experimental Methods in Psychopathology. Carney Landis, *Psychiatric Institute, New York, N. Y.* *Mental Hygiene* 33:96-107, January 1949.

Research has brought great dividends to mental hygiene during the past twenty-five years. Electroencephalograms, electro-convulsive therapy, psycho-surgery, insulin-shock therapy, dilantin, diagnostic psychological tests and so on, have made the picture of mental disease and mental health much more hopeful than ever before in history. The experimental method has an honorable history in psychopathology. It should be used more extensively. We are much more apt to aid than to injure the patient by using well-conceived experimental techniques. Careful, wise consideration must at all times be employed, but just as experimental surgery is drastic, but carries forward the conquest of physical disease, so should experiments in psychopathology carry forward the conquest of mental disease. Experimental studies in psychopathology can and should do much in the near future to make rational the now irrational methods of shock therapy and psycho-surgery. In the last analysis, progress depends on the gains made in pure science. Mental hygiene and psychopathology should contribute to the cause of pure science much more than they have in the past. There is need to look above the terrible immediate urgency of the problems of neuroses and psychoses to the forwarding of basic knowledge, so that new and, to the practical mind, undreamed of methods may be made available for future progress.

The Nature and Function of Emotions, a Concept. S. H. Tyler, *Raymond, Minn.* *Am. Pract.* 3:368-75, February 1949.

This article was written principally for use by non-psychiatrically trained men to provide them with a working concept of the nature and function of emotion in terms of altered physiology. A method is suggested by which mental concepts, character traits and chronic habit patterns of behavior may give rise to specific, prolonged and abnormal (in degree) physiological changes, thus producing diseased states or aggravating troubles already present.

Emotion is that innate force which causes us to do every voluntary act and prepare the body for that act. Further, it is essentially an automatic mechanism by which the mind makes demands upon the body for protection against undesirable external forces. Instincts, on the other hand, are thought of as demands made by the body upon the mind or other parts of the body (homeostasis) for protection against undesirable internal forces. A diagram is given which clarifies the three specific steps in development and expression of an emotion. The first step is entirely unconscious and automatic or reflex in nature depending upon previous conditioning of the subject. One might think of a person previously conditioned to fire in the form of flight and terror following the burning of his home. Future associations with fire will inevitably and automatically stimulate changes toward the internal and skeletal attitude for action appropriate in the case of flight and terror. The second step constitutes what is ordinarily known as "feeling" the emotion. This is the impression made upon the mind by impulses coming through the proprioceptive and enteroceptive nervous systems making conscious the body's preparation to perform some specific type of activity. The third step is the expression of emotion and should be considered a means of getting rid of the mobilized energy or feeling.

Emotions in general are discussed with reference to the qualities of expression of aggression against external forces (the sympathetic stimulators) and the passive escape response (the parasympathetic stimulators). Special attention is given to the terms 'fear' and 'anxiety' suggesting that these might be more clearly understood if they were not thought of as "emotions at all but merely an awareness of danger from the outside and the emotional element would come in the form of response to this threat.

The point is suggested that we cease to think of emotional or organic diseases but rather think of and treat the emotional elements in the disease picture. 5 references. 1 figure.—*Author's abstract.*

The Psychopathologic Aspects of Anxiety (*Psychopathologie der Angst*). P. G. von Stockert, Frankfurt Am Main, Germany. Med. Klin., Munich 43: No. 17, 478-82, Sept. 1948.

The etiology of anxiety neurosis varies widely. Brain injury, senility, severe shock, somatic disturbances such as infectious intoxication or degeneration of the metabolic, endocrine and other functions of the body (for instance, in Basedow's patients) may lead to this state. More often, it is a result of emotional defects, constitutional or acquired.

The parasympathetic and sympathetic systems, in this condition, appear overexcited (reddening or pallor of the face, respiratory disorders, abnormal heartbeats, lowering of the muscle tone, to the point of narcolepsy, etc.). The chronic tension due to anticipation of some vague imminent danger (rooted in a general feeling of insecurity) frequently manifests itself in hysteria.

A common symptom is the inability to maintain proper contact with one's environment, even when it is favorable (in congenital neurosis). The acquired state is usually traceable to a hostile environment, but the wrongs and slights need not be real; fancied injustice or offenses are just as effective in causing maladjustment which might eventually lead to a breakdown.

In sex life, as is well known, anxiety may lead to impotence in men and vaginismus in women. The underlying cause is sometimes identified as an unhealthy attitude toward the natural urge, conditioned by faulty upbringing or an unsympathetic environment. In many cases the disturbance goes back to a shock caused by violence or a similar offensive experience.

A tendency to idealize one's ego, leading to failure in conforming to the ideal, often ends in frustration, with the accompanying symptoms: a feeling of guilt, non-belonging and insecurity, culminating in anxiety neurosis.

Evipan acts as a depressant in anxiety, whereas in true melancholia it produces a sedative effect, frequently leading to euphoria.

## 14. Treatment

### a. General Psychiatric Therapy

*See Contents for Related Articles*

### b. Drug Therapies

Combined Coramine-Electroshock Therapy in the Treatment of Psychotic Excitement. *Howard D. Fabing, Cincinnati, Ohio.* Am. J. Psychiat. 105:435-38, December 1948.

A new method of shock therapy in which the application of electroshock is preceded by the intravenous administration of 5 cc. coramine is described. This technic has been used in 100 cases admitted to the neuropsychiatric service at the Christ Hospital, Cincinnati. It appears to be a useful means of terminating states of psychotic excitement more rapidly and more effectively than with electroshock alone.

The initial case was that of a 28-year old postpartum patient admitted in a state of acute manic excitement which was uncontrolled by any measures, including orthodox electroshock. Progressive exhaustion was extreme and it was feared that the patient might die. The administration of combined coramine-electroshock treatment produced a sudden reversal in the patient's condition. She received 5 of these combined treatments at 24-48 hour intervals, became progressively more quiet and soon assumed her premorbid behavior.

A similar encouraging and dramatic result was obtained in another case of manic excitement requiring 7 combined coramine-electroshock treatments. It was then decided to try the method in other types of psychotic excitement. Schizophrenic excitement and hysteria of panic proportions were found to respond favorably. Further trial demonstrated that combined coramine-

electroshock therapy was of value in paranoid states when excitement was great and in occasional selected cases of severe intractable anxiety. In agitated melancholia it was noted repeatedly that if the symptoms of restlessness, agitation and motor stereotypy do not respond to orthodox electroshock therapy the intravenous injection of coramine preceding electroshock treatment often terminates these manifestations abruptly. There appears to be no advantage in applying the combined method in cases of simple melancholia where excitement is not present.

The type and duration of the convulsion appears to be similar whether simple electroshock or the combined method is used. Respiration is restored following the combined coramine-electroshock more quickly and efficiently. It is very rare that patients have excited postfit confusional reactions after coramine has been used. Almost invariably the patient falls into a sound sleep for minutes to hours following this method. A 5 cc. dosage of coramine suffices in a great number of patients, but on rare occasions the dose is raised to 7 cc. in patients weighing well over 200 pounds and reduced to 3 cc. in patients weighing less than 90 pounds.

The theoretical considerations which prompted this technic are as follows: It was reasoned that the essential neurophysiological situation in mania is due to a brain which is in a state of pathologic excitation, and which is firing from many areas simultaneously and/or in quick succession at random, and which is deprived of its normal orderly integrative action on this account. It was assumed that the object of electroshock in these cases is to excite an already excited cortex even further in order to bring about an *ultraparadoxical* excitation with consequent inhibition. The concept of the *ultraparadoxical* in neurophysiology is that of Pavlov who described the phenomenon as follows:

"A stimulus, the intensity of which is beyond the maximum, instantly elicits inhibition, thus distorting the rule of the relationship between the magnitude of the effect and the intensity of excitation."

Upon this basis the method has been used in other forms of clinical excitement with good results. Psychotic excitement may come to a dramatic end after as few as one or two combined coramine-electroshock treatments. The method has proved of value in handling excited patients on an open psychiatric ward in a general hospital without resort to complex techniques of restraint. 5 references.—*Author's abstract.*

### c. Psychotherapy

Group Psychotherapy with Neurotics. *Florence Powdermaker and Jerome D. Frank, Veterans Administration, Washington, D. C., Am. J. Psychiat. 105:449-55, December 1948.*

This is a preliminary report of a research project on analytical type group psychotherapy with neurotic and ambulatory psychotic veterans in a United States Veterans Administration Mental Hygiene Clinic.

Nine groups under seven psychiatrists are being studied. Groups containing 4-12 members selected by the doctor in charge of the group as suitable, meet once or twice a week for 1½ to 2 hours. Most patients receive concomitant individual therapy.

Individual patients are evaluated through special clinical, psychological, and social work studies before, after, and during treatment. Each group session is recorded by a wire recorder and by a trained observer who makes a full narrative account, which he checks in discussion with the doctor after the meeting. Doctors find these discussions useful in broadening their objectivity and self-confidence. Patterns of events which seem to have meaning for the therapeutic process are studied in detail by the method of "situation analyses".

Seminars of the doctors provide an opportunity for group discussion of technical problems and failures. Tentative formulations are offered concerning attributes and techniques of the therapist as they affect the therapeutic process, and stages of development of the group. A situation analysis illustrating how group psychotherapy helped a rigid intellectual to break through his neurotic defenses is presented in full. 7 references.—*Author's abstract.*

Group Psychotherapy in a State Hospital. *William Gray, Worcester State Hospital, Worcester, Mass.* J. Nerv. & Ment. Dis. 108:485-95, December 1948.

A group of thirty female state hospital patients was observed through a total of eighteen group psychotherapy meetings. The majority of these patients were schizophrenics who had been sick for less than one year. Most of them received electric shock therapy concomitantly with their attendance in the group. Although it is felt that the majority benefitted from group psychotherapy, little of a definite nature can be said about the degree of improvement which can be attributed to group psychotherapy. However some of the observations made are felt to be of interest. These include the relationship of participant activity to improvement, the value of having some aggressive members in the group, the mechanism of beneficial action, the relationship of the acutely disturbed patient to the group and the use of the group for purposes of diagnosis, evaluation and teaching. Participant activity is meant to include such features as the degree of spontaneity, leadership in discussion, alertness and verbal activity of the individual patients. It was found that those patients showing moderate or slight participant activity tended to show the greatest degree of improvement. On the other hand, aggressive patients with high levels of participant activity were found to promote group functioning when they were present in a ratio of two such patients in a group of ten or fifteen members. In regard to the mechanism of beneficial action, the socializing influence of the group seemed most important. This included the gain in self-esteem and

self-confidence that accrued to these psychotic patients from having what they had to say listened to carefully by the therapist and by the group, even when their contributions were tangential and illogical. Many of the patients were noted to be somewhat startled and pleasantly surprised by this. On two occasions a markedly sedative effect was noted on two acutely disturbed patients. On coming to the group both of these patients were actively hallucinated and disturbed in their behavior. After wandering about the room for ten or fifteen minutes, both of them became interested in the discussion and thereafter became rather model patients. The difference in activity, clarity of thought and affective reaction in the same patient when seen in staff conference and during group meetings was often of striking degree. Within the permissive atmosphere of the group, patients were freer, less subject to blocking of thought and conscious guarding and were more likely to show appropriate and adequate affective reactions. This is felt to be of value in diagnosis, evaluation and teaching. Two medical students who observed the group in action commented on the greater appreciation they had obtained of the personality structure and functioning of the psychotic patient. 13 references.—*Author's abstract.*

The Role of The Social Field In Psychotherapy. *Abraham S. Luchins, New York Regional Office, Veterans Administration.* J. Consult. Psychol. 12:417-25, Nov.-Dec. 1948.

Action research and technics are of various types, all of which have in common their concern with problems arising directly out of community life and community needs. An action program is proposed which will further the creation of interpersonal relations conducive to mental health and for the development of group action to find places in the community for mental patients, where they can serve in a productive capacity and become integral members of the community. For a psychotherapeutic action program to be effective, it must be the joint undertaking of psychiatric, psychological, educational, and social science organizations (of clinical personnel, social psychologists, sociologists, educators, ethnologists and others who have experience in community organization and planning) and of responsible lay members of the community.

First, both in particular communities and on a broader scale, research is called for to determine (1) which social field conditions are conducive to mental health and which are conducive to the production and continuance of personality disturbances, and (2) what can be done to mitigate such effects or to prevent such situations from arising. Second, it is necessary to survey possibilities of utilizing some of the mentally ill in some socially acceptable and productive capacity. Third, there must be an intensive educational program for the public. Its aim is to inform the public of the frequency, variety, and nature of personality disturbances, of the social conditions of daily life which are conducive to such disturbances, and to

make the public see that they can actively participate in their own communities in the prevention and treatment of mental illness. The hub of the psychotherapeutic action program is envisaged as a community-centered, action-orientated mental hygiene clinic, whose aims will be the prevention of personality disorders, education of the public, treatment and rehabilitation of those mentally ill individuals living in, or near, the community who are not so disturbed that they require institutionalization. For those individuals who are not ready to reside or work in the usual community, there should be protective workshops and sheltered communities. 10 references.

#### d. The "Shock" Therapies

The Effects of Electric Convulsive Therapy On The Functioning of Mental Patients.

I. Introductory Remarks. *Albert Rabin, Michael Reese Hospital. J. Person. 17:1, September 1948.*

A Round Table discussion at the 19th annual meeting of the Eastern Psychological Association attempted to clarify the status of current research in electric convulsions as it has proceeded along two major lines: (1) experimentation with and observation of the behavior and structural changes in animals, (2) study of minute and gross psychologic effects of electrically induced convulsions upon psychiatric patients. Some original research in these areas was also presented. ECT developed as an empirical method of treatment in psychiatric disorders, and after some years of application is still in search of an adequate and convincing scientific rationale.

V. Memory Loss Following Electric Convulsive Treatments. *Irving L. Janis, Yale University. J. Person. 17:29-32, September 1948.*

The problem of memory loss was investigated in connection with a series of electroconvulsive treatments. A group of 19 patients representing a cross-section of patients who received ECT in the two psychiatric hospitals where the study was carried out were equated with a control group of 11 patients in the same hospitals. Each group contained several neurotics and a fair number of borderline schizophrenics as well as some manifestly psychotic cases. The patients in the electroshock group received a minimum of 8 convulsive treatments spaced 3 times a week. It was found that every one of the 19 patients in the electroshock group displayed definite retro-active amnesias, as of approximately 4 weeks after the termination of ECT. In contrast, the memory of the patients in the control group remained unimpaired. An important characteristic of the amnesias is the fact of circumscribed memory gaps. The amnesias are not limited to events of the recent past. From the content of the forgotten material, it appears likely that the amnesias are selectively determined. Suicide attempts, visits to psychiatrists, disturbed episodes leading to hospitalization, and similar

features of the patient's psychiatric history are more likely to be forgotten than other types of past experiences. It was found also that the post-ECT amnesias persist well beyond the usual period during which there is recovery from the transient "organic" effect of ECT. Further, in a number of cases there appeared to be a very close relationship between the reduction of disturbing effect produced by ECT and the occurrence of the post-ECT amnesias; which suggests the possibility that the posttreatment amnesias may involve a repression mechanism which plays at least a secondary role in maintaining whatever clinical improvement is achieved by the organic changes produced by electroconvulsive treatments.

VI. Memory Functioning In Patients Treated With Electroshock Therapy. *Joseph Zubin, Columbia University. J. Person. 17:33-41, September 1948.*

At least 4 different phases of memory are involved in electroshock treatment. The first deals with the immediate effects which are apparent at the moment the circuit is closed. The second deals with the memory losses which seem to become aggravated after about the fourth or fifth treatment session. The third deals with the general confusion and disorientation which occur between treatment periods and which no doubt affect the entire mental life of the individual. Finally, the fourth deals with the long-range net effect of the treatment after the cessation of electroconvulsive therapy. The type of memory loss in each of these four phases differs considerably. In order to determine the characteristics of each of these four aspects of memory loss, careful observational and experimental studies were made. By utilizing implanted memories it was found that recall and relearning show a complete loss after shock, whereas recognition memory is hardly touched by the shock treatment. Another result was that remote memory was less affected than recent memory. An interesting paradox arises from the fact that "relearning" memory, which is usually a very sensitive measure since it taps memory traces which are below the threshold of immediate recognition, fails to reveal any retention; whereas recognition does reveal some retention. As a result of an investigation of this phenomenon it is concluded that the shock does not destroy the memory trace but simply disorganizes it.

Whether or not memory losses constitute a basic feature of electroshock therapy is still debatable. The hypothesis that the patient recovers because his memory for adverse events or situations is wiped out is hardly tenable, since no evidence for destruction of memory traces is now available. The evidence from loss of familiarity seems to be highly suggestive. Since the feeling of familiarity bridges both the field of memory and the field of emotion, it may be possible that a lowering of the threshold of familiarity is sufficient to free the patient from his anxieties about certain events which

formerly proved to be disruptive of his organized mental life. It is this link between emotion and memory that may contain the essence of the change that occurs in electroshock therapy. 5 references.

VIII. Discussion and Concluding Remarks. *Paul H. Hoch, New York Psychiatric Institute.* J. Person. 17:48-51, September 1948.

The action of electroshock remains unknown. All the researches on Shock Treatment have illuminated neither the etiology of the mental disease nor the *modus operandi* of the treatment itself. For instance, to mention some of the psychologic explanations, it was felt that the production of unconsciousness or memory impairment or the patient's fear of the treatment was an important therapeutic mechanism. It is quite possible that some of these mechanisms play a role affecting the patient's mental functioning, but in general none of the psychic phenomena or epiphenomena actually explain the action of electroshock. The amnesia produced by convulsive treatment has often been assumed to be a therapeutic factor, but it has to be pointed out that amnesia does not occur regularly in shock-treated patients. Psychologic investigations of memory functions, orientation, emotional attitude for the patient are of great importance, but it is a mistake to make every such finding a major etiologic mechanism in the treatment of mental disorder. What is actually being dealt with is an organic treatment altering the metabolism of the brain tissue and these changes produced in brain tissue have to be studied in correlation with psychologic changes. Shock treatment is not psychotherapy. The fact that the results of treatment may be psychologically understood does not mean that the treatment acts as a psychologic agent in the common meaning of the term.

*References to Current Articles*

- II. The Effects of Electrically Induced Convulsions on Animal Behavior. *Edward Stainbrook, New York State Psychiatric Institute.* J. Person. 17:2-8, September 1948.
- III. The Theoretical Bases of Convulsive Therapy in Relation to Animal Experimentation. *Bernard F. Riess, Hunter College.* J. Person. 17:9-15, September 1948.
- IV. Contributions of Research on Infrahuman Animals to the Understanding of Electric Convulsive Shock Phenomena. *Roger W. Russell, Western State Psychiatric Institute and Clinic, and University of Pittsburgh.* J. Person. 17:16-28, September 1948.
- VII. Patients Who Received More Than One Hundred Electric Shock Treatments. *Albert Rabin, Michael Reese Hospital.* J. Person. 17:42-47, September 1948.

Late Social Results of Prefrontal Leucotomy. *R. Strom-Olsen and P. Macdonald Tow, Runwell Hospital, Essex, England. Lancet 1:87-90, Jan. 15, 1949.*

There is increasing use of prefrontal leucotomy. Much evidence is available of the disappearance of present mental symptoms, but not of the lasting defects produced in the whole person. The psychiatric recovery is often gained at the expense of great reduction of the efficiency, enjoyment and acceptability of the person.

The patients used for this study were operated on by Mr. G. C. Knight 7 to 3 years ago. Group C was 100 chronic severely disordered psychotics of the worst psychiatric prognosis. Group A was 25 severe neurotics, admitted to hospital specifically for the operation. The A cases are multiplied by 4 for comparison.

*Illness:* Terms used qualitatively in conventional sense, but refer only to the effect on the preoperative psychiatric illness.

*Status:* "Social recovery" implies that the patient is at home, in harmony with his fellow citizens, an active and satisfactory social fit. 17 C patients were discharged.

		C	A
<i>Illness</i>	Cured	9	40
	Much Improved	24	36
	Improved	25	16
	No better	36	8
	Worse	6	0
<i>Status</i>	Social recovery	13	44
	No better	73	56

Prefrontal leucotomy is of great value in severe psychotics but the time has come to realize precisely how much the operation achieves; or how little, in ultimate social advantage. A similar social result, though with a different qualitative pattern, might be obtained with intensive convulsion or insulin treatment. C cases, chronic psychotics of hopeless prognosis, are the main indication. In A cases, there are some in whom the advantages of operation are outweighed by damage to the personality. The increasing tendency to operate on sane patients should perhaps be limited to intractable obsessional and depressive states with prolonged total incapacity. 4 references.—*Author's abstract.*

Electric Shock Treatments in Child-Psychiatry. (*L'elettroshock nella psichiatria infantile.*). *F. Occornero and N. Anderson, University of Rome, Rome, Italy. Lavoro Neuropsichiatrico 3:232-49, Fasc. 2, 1948.*

Results from the administration of electric shock treatments in 15 children, ranging in age from 6 to 14 years, are reported. In 8 of these patients there was a more or less certain diagnosis of schizophrenia; in these

cases no appreciable beneficial effects were obtained. In a case of catatonic pseudo-dementia, and in 2 cases of acute toxi-infectious psychosis the results were excellent. One child with an unexplained maniacal excitement state was improved. In a child with petit mal epilepsy, and in 2 with epileptic equivalent, a prolongation of the latent periods between attacks was procured.

As many as 25 shocks were administered a single child. The usual dosage was 110 volts for periods of 0.09 to 0.10 of a second. There were no determinable complications or sequelae. Although the material is admittedly meagre and the results not too thoroughly checked, these results are reported here with the thought of encouraging the use of shock therapy in children whenever such a course may seem indicated. 19 references. 1 table.

Electro-shock and Electro-narcosis (electro-coma) in the Treatment of Mental Troubles. (*L'electrochoc et l'electronarcose (electrocoma) dans le traitement des troubles mentaux.* A. Spencer Paterson, West London Hospital, Department of Psychiatry, London.) *Acta Neurol. et Psych. Belgica.* 48:467-479, October 1948.

A review of the first 50 cases treated by electronarcosis and review of the first 50 cases treated by electronarcosis and controlled ECT showed that some cases of severe agitation and mental tension which had failed to respond to ECT cleared up rapidly with electronarcosis.

#### Reference to Current Articles

Organic Changes In Convulsion Therapy: Variations of Blood Pressure, Pulse Rate, Temperature and the Ocular-Cardiac Reflex during the von Meduna and the Cerletti Treatments (*Modificacoes organicas na convulsoterapia. Alteracoes da pressao sanguinea, pulso, temperatura e reflexo oculo-cardiaco de von Meduna e Cerletti*). L. Cerueira, The Bahia Sanitarium; Faculty of Psych. and Med., University of Bahia, Brazil. *Neurobiologia* No. 1, 1-26, March 1948.

## NEUROLOGY

### 1. Clinical Neurology

The History of Neurology In the Last One Hundred Years. *Henry R. Viets, Harvard Medical School.* Bull. N. Y. Acad. Med. 24:772-83, December 1948.

A review of neurology of the last one hundred years is presented, special attention being paid to five figures, Romberg, Duchenne, Charcot, Jackson and Erb. Romberg's fame rests not only on his textbooks but on his definition of the clinical aspects of tabes dorsalis and his brilliant pathological surmise "that the posterior sensory roots are occasionally alone affected in conjunction with the posterior of the spinal cord, the anterior motor column and nerve retaining their normal structure." Duchenne's contribution to neurology is signalized by his clinical descriptions of progressive muscular atrophy, poliomyelitis, tabes dorsalis, glossolabiolaryngeal paralysis and pseudo-hypertrophic paralysis. Charcot is remembered in the artery of Charcot, Charcot's disease, amyotrophic lateral sclerosis and the changes in the joints in tabes dorsalis. He must be considered as the greatest contributor to our knowledge of structural disease of the nervous system. Jackson contributed three important concepts to neurological thought: the type of epilepsy that goes by his name, his theory of aphasia and his doctrine of levels of function of the nervous system. Erb's greatest gift to neurology was probably in the field of teaching, for it is to him we owe the development of an orderly and systematic manner of examination, so fundamental to diagnosis. He pointed out, also, the importance of changes in the reflexes as a sign of disease. These men influenced neurology the most, but no one would minimize the impact on neurological thought of their colleagues and pupils. It is concluded that the advance of knowledge in neurology, as in other disciplines, is mainly the result of individual effort. 23 references.

Problems of Multiple Sclerosis. (*Problemes de la sclerose en plaques*) Ludo van Bogaert.) Acta Neurol. et Psych. Belgica 48:429-448, September 1948.

The theory attributing the lesions of multiple sclerosis to cerebrovascular changes goes far back to Rindfleisch (1863) and is still very instructive. Ribbert had also incriminated in 1882 a thrombotic mechanism. Exactly fifty years later the school of Tracy Putnam reconsidered the problem, becoming the defenders of a conception attributing to multiple thromboses in the small veins the myelinic rarefactions in multiple sclerosis and disseminated encephalomyelitis.

The writer then compares the work of Dow and Berglund with those of Putnam and Scheinker and states that their divergences are due mostly to the histopathologic criteria they believe in. The conception of neuro-

pathologists concerning the thromboses is controlled by the observations made in the arterial thromboses, but Putnam and Scheinker showed that despite the apparent integrity of the walls of the veins, they can be obstructed by a thrombus and that the minute examination of the endothelium may seem normal.

There are numerous foci where the vessels show neither modifications nor obliterations of the veins. These venous alterations exist, but represent accompanying phenomena and are not the real and direct cause of the primary disorder. Neurologists and the neurosurgeons however, have tried to establish a form of treatment from this thrombotic theory of multiple sclerosis, like sympathectomy, cervical ganglionectomy, etc. The writer passes to the second theory on multiple sclerosis, the one based on the composition of the blood. He states that the researches in this field remained negative, except for the coagulation of the blood. Therefore they have oriented their experiments toward anticoagulative substances.

The author summarizes the above findings and states that in these conditions the genesis of the sclerotic plaque can be traced to the following phases: 1. a product of myelinic disintegration passes into the blood-stream by means of a disorder in the hemato-encephalic barrier, the permeability of which is abnormally increased; 2. it provokes the elaboration of anti-brain antibodies in the system; 3. and when these antibodies reach an optimum proportion towards the antigens, the sclerotic lesions appear. This elementary mechanism can in its turn be inhibited or accelerated by a whole series of factors that one starts to disclose. Substances like polysaccharides can inhibit the sensitization, and the lack of them can facilitate it. He states also that the production in the brain of anti-brain antibodies during an alteration of its parenchyma is not a paradox. One knows to-day that these anti-brain antibodies belong, as all the antibodies in general, to the gamma fraction of the globulins. It seems that these gamma globulins exist effectively in the blood and the cerebrospinal fluid of the patients suffering from multiple sclerosis, which would explain the false reactions of syphilis that one sees during the course of multiple sclerosis and certain colloidal curves in the fluid, described in this disease. The writer concludes that the three directions discussed in this paper trying to analyze and synthesize the development of multiple sclerosis are not divergent, on the contrary. The first series of works tries to understand why the centers of demyelination are localized in certain vessels, in particular the small veins. The second considers a pathologic and lasting increase of permeability in the vessels, that is to say an impairment of the barrier. The third tries to understand the mechanism of the production of these centers and arrives at the conclusion that they are caused by an allergic or hyperergic reaction between the antigens issued by the myelinic lysis and the antibodies they provoke. Clinical facts observed in multiple sclerosis agree with an allergic or hyperergic conception of this disease. 51 references.

Geographic Distribution of Multiple Sclerosis. *George Ulett, St. Louis, Mo. Dis. Nerv. System* 9:342-46, November 1948.

It is frequently stated that multiple sclerosis occurs more commonly in colder climates, yet support for such statement in the literature is not conclusive. It was believed that further clarification of this question could be had by a survey of Continental United States and a comparison of the incidence of multiple sclerosis as seen by private practicing neurologists and in recognized hospitals in the warmer, as contrasted to the colder portions of the country. The study includes the twelve months period from January 1, 1944 to December 31, 1944. The questionnaire technic, despite its drawbacks, seemed the most practical way to investigate this subject. Two sets of questions were prepared; one was mailed to practicing clinical neurologists, the other to hospitals. Inasmuch as hospitals differ widely in methods of computing total medical admissions and as many hospitals keep no records of total neurological admissions, some unrelated disease was selected as a standard of comparison. Hodgkin's disease, occurring as it does in a similar age group, seemed a logical choice. This disease is reputedly not influenced by climate, geographical factors, race, or local peculiarities of diagnosis or treatment. The results of the survey seemed best presented by a direct comparison of the incidence of multiple sclerosis in the northern part of the United States with the incidence in the southern part. A division of the United States on the basis of climatologic differences would seem an ideal way of selecting "northern" and "southern" states. It is a rather useful coincidence that the temperature isobar for an average temperature of 60° or warmer, includes some of all, and the greater part of most, of the states below the 37th parallel.

A comparison of the figures from the neurologists who consider their data "very accurate" and "approximately correct" reveals that those above the 37th parallel (35 neurologists in 20 states) found that 4.2 per cent of their practice was multiple sclerosis, whereas 10 neurologists in 5 states south of this boundary had 2.2 per cent of this disease in their clinical practice. Thus, the statistics for this group of neurologists show that cases of multiple sclerosis are seen more frequently by the physicians in the northern states. The results of the poll of 55 hospitals in the Continental United States showed that multiple sclerosis to Hodgkin's disease in the northern states bore a ratio of 1.6:1 (573 cases of multiple sclerosis to 355 of Hodgkin's disease), and in the southern states bore a ratio of 1.1:1 (134 cases of multiple sclerosis to 120 of Hodgkin's disease). The rates per thousand medical admissions were 4.9 and 3.0 respectively in the north, and 2.1 and 1.8 in the south. In Canada the figures showed a ratio of multiple sclerosis to Hodgkin's disease not unlike that in the northern part of the United States, while the statistics from Hawaii, the Canal Zone, and Puerto Rico showed few cases of either disease but with a reversal of the ratio, Hodgkin's disease predominating over multiple sclerosis.

Thus the statistics gathered from individual neurologists and representative hospitals in the United States seem to point to a greater incidence of multiple sclerosis in the northern or colder parts of our country. Although no etiological conclusions can be drawn from our findings, it is hoped that the trend shown here will prompt a more exhaustive study of the incidence of this disease. 16 references. 3 tables.—*Author's abstract.*

Studies on Headache. Analysis of Vascular Mechanisms in Headache by Use of the Human Centrifuge, with Observations on Pain Perception Under Increased Positive G. E. Charles Kunkle, Durham, N. C., Douglas W. Lund (Capt., M.C., A.U.S.) and Philip J. Maher (Capt., A.A.F.). Arch. Neurol & Psychiat. 60:253-69, September 1948.

Analyses of the effects of centrifugal force upon headache were carried out on the human centrifuge of the Army Air Forces Aero Medical Laboratory at Wright Field, Ohio. When the occupant of the centrifuge cab is exposed to centrifugal force in the head-to-seat direction (defined as increased increased positive g) the principal physiological effects result from a more or less profound fall in cranial arterial pressure. Preliminary studies were first completed to establish the nature of the effects which centrifugation may have upon pain perception per se. Pain thresholds to the stimulus of radiant heat and the intensities of induced pain in an arm were only slightly and inconstantly reduced during exposure to centrifugal force, effects attributable largely to distraction.

In the study of headaches of various types it was observed that:

- 1) Experimentally induced headaches of non-vascular origin arising from compression or irritation of the surface tissues of the head were only slightly reduced in intensity during exposure to 3.0 positive g; these minor changes were attributable to distraction.
- 2) Experimentally induced headaches of moderate intensity arising from distention of cranial arteries (histamine and caffeine-withdrawal headaches) were eliminated during exposure to 2.0 or 3.0 positive g, a relief attributable to a concurrent fall in intravascular pressure at the head level.
- 3) Clinical headaches of vascular origin responded similarly, for in subjects with headache related to hunger, recent head trauma, or emotional tension, all with clinical features suggesting that the pain arose from distention of intracranial or extracranial arteries, the headache was completely eliminated during exposure to 2.0 positive g. 28 references. 5 figures.—*Author's abstract.*

Headache Mechanisms. Harold G. Wolff, Cornell University Medical College. Bull. U.S. Army Med. Dept. 8:641-53, August 1948.

Headaches fall into two major categories as regards their origin: (1) those that arise mainly as a result of stimulation of intracranial structures, and (2) those that occur on stimulation of tissues on the outside of and

adjacent to the skull. From the data available six basic mechanisms of headache have been formulated. Headache may result from (1) traction on the veins that pass to the venous sinuses from the surface of the brain and displacement of the great venous sinuses; (2) traction on the middle meningeal arteries; (3) traction on the large arteries at the base of the brain and their main branches; (4) distention and dilatation of intracranial arteries; (5) inflammation in or about any of the pain-sensitive structures of the head; and (6) direct pressure by tumors on the cranial and cervical nerves containing many pain-afferent fibers from the head. Intracranial diseases commonly cause headaches through more than one of these mechanisms and by involvement of more than one pain-sensitive structure. Traction, displacement, distention, and inflammation of cranial vascular structures are chiefly responsible for headache from intracranial sources.

From the data it is concluded that the headache associated with either decreased or increased intracranial pressure results from traction or displacement of pain-sensitive intracranial structures and is independent of intracranial pressure changes *per se*. That increased intracranial pressure is not the dominant factor in headache associated with brain tumor was suggested by an analysis of 72 patients. There is evidence that histamine headache results mainly from the dilatation and distention of cerebral arteries. There is reason to believe that the mechanism of headache in fever and that of the headache following the injection of histamine are similar and that, in both, the intracranial arteries are the chief contributors to the pain. The headache of migraine is produced primarily by distention of cranial arteries, chiefly, but not exclusively, the branches of the external carotid; and procedures that constrict the cranial arteries and thus reduce their amplitude of pulsation will diminish or terminate the headache. Studies made of the headache associated with hypertension have revealed that essentially the same mechanism is operative in producing the pain as in producing the migraine headache. Studies demonstrated that noxious stimulation in any part of the head or emotional tension led to sustained contraction of the scalp and neck muscles. This sustained muscle tension secondarily gives rise to pain from the shoulders, neck, and head.

The Differential Diagnosis of Poliomyelitis. *Henry W. Woltman, Mayo Clinic, Rochester, Minnesota.* Illinois M.J. 94:299-306, November 1948.

The differential diagnosis of poliomyelitis concerns the disease from onset to residua. In its most practical applications the differential diagnosis must be tripartite. First and foremost, the diagnosis must be made in the febrile neuro-irritative period, when various types of meningitis, encephalitis and myelitis move into focus. Then, since not all patients are seen early, comes the differential diagnosis in the course of the neuromuscular period. At this time the physician's chief concern is with rapidly oncoming muscular paralysis and pseudoparalysis, of various kinds and many causes. Eventually

a diagnosis must be made by retrospect. The making of this diagnosis involves consideration of paralytic residuals of nonpoliomyelitic origin, developmental anomalies and neurodegenerative diseases of such imperceptible progression that their sudden discovery belies their long existence. In the differential diagnosis it should not be forgotten that poliomyelitis may complicate any physiologic event, such as pregnancy, or some other disease or injury. 3 references, 2 tables.

Organic Impairment Simulating Mental Deficiency. *Temple Fay, Neurophysical Rehabilitation Clinic, Philadelphia, and Edgar A. Doll, The Training School, Vineland, New Jersey.* Am. J. Orthopsychiat. 19:112-19, January 1949.

Argument and case history are presented to indicate possible errors of classificatory diagnosis in patients with atypical developmental retardation simulating mental deficiency but actually owing to organic impairment. Manifestations of pressure, and discomfort and chronic headache play a large role in so-called abnormal behavior. Spinal drainage or prolonged periods of fluid balance are followed by a definite quieting effect with increase in attention and interest. A condition of pseudo feeble-mindedness may arise from expressive defects ascribable to restlessness and distraction caused by the discomfort of prolonged intracranial pressure and headache. Advances in knowledge of cerebral hydrodynamics have led to a better understanding and treatment of children who may be suffering from reading and language disabilities and associated behavior problems. The current thinking on the motor aspects of speech, and the maturational aspects of reading acquisition all point in the same direction. So also, the orthopsychiatric orientation toward disturbances of behavior and emotional adjustment suggests the importance of the complete appraisal of the individual in respect to these organic and maturational issues. For complete understanding it is evident that the joint efforts of medical specialists, psychologists, educationists, and social workers is desirable. Under suitable regimen, patients simulating mental deficiency warrant optimistic prognosis and consequently well-designed collaborative treatment procedures. It is suggested that perhaps some reports of cure or amelioration of mental deficiency may be owing to errors of initial classification and that the interpretation of such partial or total recoveries lies outside the principle of the essential incurability of genuine clinical feeble-mindedness. 8 references.

Clinical Aspects of Cerebral Localization. *Edwin A. Weinstein, Mount Sinai Hospital, New York, N.Y.* M. Clin. North America. 32:721-26, May 1948.

There are no mental symptoms that are specific for disease of any portion of the brain. It cannot be said, for instance, that euphoria or loss of memory are signs of involvement of the frontal lobe. These disturb

ances do not occur as individual manifestations but as part of a more general disturbance of personality. Personality cannot be divided into emotion and intellect. Bilaterality of involvement is important in the production of mental symptoms. The rapidity of growth of the causative lesion is also a most significant determining factor. In a slowly progressing process, the early mental symptoms are likely to be irritability, anxiety, forgetfulness, diminution of interest, or difficulty in concentrating. In a quickly growing lesion in the same location, the initial picture may be of delirium, disorientation, confusion or stupor.

Mental symptoms may also occur in focal intracranial disease, both above and below the tentorium. In the tumors studied at The Mount Sinai Hospital in the past 20 years, mental symptoms occurred about twice as frequently in supratentorial as in infratentorial growths. In tumors, intracranial hypertension was frequently associated with the presence of mental symptoms. *Euphoria and increased psychomotor activity* may be seen not only in lesions of the frontal lobes but also in disease elsewhere in the hemisphere and often in lesions about the third ventricle. *Diminished activity and somnolence* may appear in lesions in the same areas. *A manic type of behavior* with memory loss, hallucinations and confabulation is not rare in lesions about the third ventricle. *Hallucinations*, unassociated with other symptoms, do not help in localization. When a formed visual hallucination occurs in association with a defect in the visual field, then it points to a defect in the temporal lobe opposite the field defect. When complex hallucinations with peculiar smells or tastes are experienced, there is again strong evidence for a temporal lobe localization.

In general mental symptoms must be evaluated along with other neurological manifestations. The more diffuse and bilateral the pathological condition is, and the more rapidly it develops, the more likely one is to see disturbances in behavior.

On Senile Disorders of Gait, Including the So-Called "Senile Paraplegia". MacDonald Critchley, *National Hospital, Queen Square, London*. Geriatrics. 3:364-70, November-December 1948.

It is argued that the term "senile paraplegia" is not altogether appropriate in clinical neurology, for at times the phenomenon is neither "senile" nor "paraplegic." The major objections are: (1) Senile paraplegia is not a well-defined clinico-pathological entity. (2) The morbid anatomy may rest upon degenerative vascular changes which are not necessarily an old-age effect. (3) The weakness of the lower limbs may vary in its nature within the widest possible limits, so that "paraplegia" may at times be an actual misnomer. (4) The motor affection of the legs may or may not be accompanied by other neurological disorders; sensory, spincteric, vasomotor, and so on.

The clinical varieties of senile paraplegia are classified as cortical, subcortical, spinal, and muscular. With regard to the cortical and subcortical types, two points are emphasized. Cortical paraplegia may result from an isolated and solitary cerebrovascular accident and may therefore appear with some abruptness. Secondly, it is not rare to find a bilateral weakness of the legs following an isolated apoplectic hemiplegia. 20 references.

Aphasia and Artistic Realization. *Th. Alajouanine*. Brain. 71, Pt. 3: 229-41, September 1948.

The question as to what happens to productive literary, musical or pictorial activity after the onset of aphasia is discussed on the basis of material drawn from three histories concerning three great artists whom the author was privileged to follow over a long period, and whose work before their illness allowed a precise comparison between their artistic production before and after their aphasia. It is concluded that the painter may continue with his artistic production despite aphasia, because it impairs a language, but leaves himself to use his visual perceptions to create, through technical means, form and light values, a sensorial use of reality, but unable to use a language made up of symbols. In agreement with Jackson's idea that aphasia does not alter the whole of intelligence, but only part of it, artistic creation becomes impossible when aphasia disturbs technics based on visual perceptions. This fact also shows that a theory such as Gestalt cannot be applied in every case, or to every form of aphasia. On the contrary, it seems to agree with Henry Head's view on the part played by alteration of symbolic thinking in aphasia. If art is just "overcome difficulty", one must agree that aphasia creates for writers and musicians a major, insuperable difficulty: realization of an artistic language with deteriorated tools. The painter, with an impaired language tool, may use untouched visual perceptions and continue with his artistic creation. This implies several things: (1) The different nature of the psychophysiology in artistic realization in the writer and composer on the one hand and in the painter on the other. (2) The main part played, in the disturbance caused by aphasia, by the alteration of technic which remains localized in language. (3) The preponderance of altered means of expression in the failure of artistic realization, as compared with preservation of conceptual thinking. (4) Intellectual interference in aphasia, as far as artistic creation is concerned, remains localized mainly to expressive means based on language.

Delays and Errors in the Diagnosis of Brain Tumor. *Fredrick C. Redlich, Rembrandt H. Dunsmore and Eugene B. Brody*, Yale University School of Medicine, New Haven, Conn. New England J. Med. 239:945-50, Dec. 16, 1948.

One hundred proven cases of brain tumor were studied in an effort to determine the seriousness of delay and error in brain tumor diagnosis from the public health viewpoint. The following aspects of the cases were

tabulated: initial complaints; first neurological signs detected; correct and false diagnosis by the family physicians; accurate and inaccurate diagnosis after hospitalization, but before diagnostic study by specialists; the diagnostic contributions of cerebrospinal fluid studies; electroencephalographic studies radiological and air studies; the time lost between the appearance of the first signs and symptoms and the time of the correct diagnosis.

Survey of the diagnoses by medical practitioners in the community revealed only 4 per cent correct. A similar survey of diagnoses made in the hospitals by non-specialists showed an increase of correct diagnoses to 29 per cent. Both groups evidenced a strong tendency to consider personality disorder as the primary etiological factor of the symptoms. Of these cases, 94 were seen by specialists, and a correct diagnosis was made in all but 7 cases.

The diagnosis of brain tumor was delayed over one year in one-half of the cases and over two years in one-fourth. Social and psychological factors often delayed referral by the family to a physician; even so, the low percentage of correct diagnosis by the practitioner was striking. A failure to carry out routine brief neurological examination and a tendency to attribute symptoms to personality difficulties with subsequent lack of further investigation, were the most important sources of error. The value of specific laboratory studies seemed to be mostly confirmatory rather than useful as independent diagnostic technics.

To avoid such delays, public health education is indicated at both lay and professional levels. Mass health education regarding early symptoms of dangerous disease appears justified. At the level of the physician, teaching of abbreviated neurological examination in medical schools and hospitals, attention to statistical tables demonstrating early signs and symptoms of brain tumor, and the routine use of certain general diagnostic procedures, especially ophthalmoscopy, should aid in preventing these errors. 7 references. 7 tables.—*Author's abstract.*

#### References to Current Articles

Pneumo-Encephalography: A contribution to Psychiatric Semiology (*Contribuição para a Semiologia Psiquiátrica: a Pneumoencefalografia*). Anibal Silveira, Celso Pereira da Silva and Mario Robortella, Juqueri State Hospital, São Paulo, Brazil. Arq. assist. psicopat. estad. São Paulo 12: 5-88, Single Number, Jan.-Dec. 1947.

## 2. Anatomy and Physiology of the Nervous System

Neurovascular Relations and Anomalies At the Base of the Brain. Sydney Sunderland, University of Melbourne. J. Neurol. Neurosurg. & Psychiat. 11:243-57, November 1948.

Attention is directed to some anatomical features which appear to have been neglected, and certain anomalous arrangements of a highly practical character which have not hitherto been described are recorded. The ob-

servations were based on an examination of the brains of 210 dissecting-room subjects in which the anatomical relations at the base of the brain were studied during and following their removal from the cranial cavity. All that is claimed for these observations is that they demonstrate that, even when the normal arrangement obtains, large arteries are on occasion so related to nerves that they may press upon, displace and deform them. In this way they could conceivably impair their function. This possibility is further increased by the presence in some cases of certain anomalous arrangements, and in others, where the vessels are the subject of atheromatous changes or are abnormally large, tortuous or pulsating. Cushing's view that obscure abducent palsies accompanying expanding intracranial lesions could in certain cases, be explained on the basis of a strangulation of these nerves by the anterior inferior cerebellar arteries is confirmed by the present investigation. In four specimens a markedly curved basilar artery swung to the left and displaced the nerve laterally. In two of these the artery curved so far laterally that it projected beneath the nerve and forced it upwards as high as the upper margin of the pons. The nerve first ascended vertically, compressed against the pons and then turned over the vessel and descended to reach the site where it pierced the dura in relation to the inferior petrosal sinus. The intimate relationship of a large arterial channel to the facial and auditory nerves in such a confined space as the internal auditory orifice and canal are anatomical features of considerable practical importance in connection with surgical exploration of the cerebello-pontine angle and certain disturbances of nerve function which may possibly arise as a direct consequence of mechanical pressure exerted on the nerves by atheromatous, enlarging, abnormally pulsating, or tortuous vessels. A tortuous vertebral artery may deform the ponto-medullary junction at the site of origin of these nerves and in this way compress them. Such a condition was observed in this series on 7 occasions on the right side and 20 on the left. Through the posterior-inferior cerebellar artery is variably related to the emerging rootlets as it courses dorsally, the relationship is always an intimate one and is frequently of such a character as to lead to the deformation and a stretching of the nerve rootlets. 32 references, 3 tables, 15 figures.

Variations in the Cytoarchitectonic Structure of the Human Hypothalamus (*Die Variabilität der cytoarchitectonischen Struktur des menschlichen Hypothalamus*). K. Feremutsch, University of Bern, Switzerland. Mschr. f. Psych. u. Neurol. 116: No. 5, 257-83, November 1948.

Microscopic studies showed practically no subdivision of the nuclei in the oral group (contrary to Brockhaus). The n. supraopticus alone stood out (larger cells and coarser rods of the Nissl substance). The n. tuberis had constant topography and cell structure but varied morphologically with the individual and, in the same subject, between the two hemispheres. The lateral part often differed from the medial portion. The corpus mamillare

always consisted of two nuclei: the n. lateralis at the oral end (uniform consistency) and n. medialis at the caudal end (zonal structure). The location was constant (next to the n. intercolatus) but individual variations were recorded in cell morphology, quality of the Nissl substance and staining properties. 12 ref., 22 photos, 2 diagrams.

The Grasp Reflexes (*Les réflexes de préhension*). L. Massion-Verniory, *The Neurologic Center, Brussels, Belgium*. Bibliotheca Psych. et Neurol., Suppl. No. 88, 1948; 88 pp.

Reactions which (in adults) are inhibited in the frontal (premotor) zone of the cortex and reappear in pathology of this region. The three forms observed are: 1) The proprioceptive type (mouth, palm, sole). True reflex, entirely involuntary. Persists in the unconscious state. Located in the lateral region of the mesodiencephalon. Disinhibition results from lesions in the frontal-tegmental path, especially in the bed of the anterior cerebral artery; also, from tumors in the first frontal convolution (posterior part) or in the first convolution of the limbic. Most often unilateral (contralateral) and only occasionally bi- or homolateral. Transferred mainly through the pyramidal path, but also through the extrapyramidal or reticulospinal fibers. Subcortical lesions in the ganglia or in the mesodiencephalon may cause the same reflex bilaterally, with loss of consciousness. 2) The tactile type, caused by touching distant skin areas (palm, sole, thigh). 3) The visual type, induced by the sight of an object. These two reactions may appear separately or jointly. They are absent in comatose states, hence require at least partial mental control. Both are inhibited in specific cortex zones: the 6th area of Brodman (premotor region), the convolution F, (posterior part), or in the area L. Vascular trouble (thrombosis, etc.) in the bed of the anterior cerebral or the callosal-marginal artery is another cause. The pyramidal path is the sole route. The corpus callosum is never involved. Pseudo-tonic and carphologic movements are sometimes associated with the above reflexes but are located elsewhere and have a different etiology. 127 ref., 14 photos.

Facts and Theories, Old and New, Concerning Nerve Conduction (*Alte und neue Tatsachen und Theorien der Nerveleitung*). A. von Muralt. Bull. Schweiz. Akad. d. med. Wissenschaften 4: 339-54, Dec. 1948.

The saltatory process of impulse propagation starts with the rest potential in the membrane caused by preferential adsorption of cations. Permeability of the wall at a given point drops as the impulse reaches it. The K-ions move into the axon and are replaced by the Na-ions coming from the outside. This results in a pulsating excitation current propagating along the axon. An action potential is set up in the fiber, lasting until the impulse is gone. Permeability then rises back to normal while the potential drops to the rest value. The excitation always travels from the neuron

toward the axon. In myelin-sheathed nerves the current proceeds from Ranvier's constriction via the medulla and membrane, then back to the point of origin. The loop carries it to the next constriction, and so on. The insulating property of myelin prevents dissipation of the charge, accelerating and extending propagation. 16 ref., 4 diagrams.

### 3. Cerebrospinal Fluid

*See Contents for Related Articles*

### 4. Convulsive Disorders

Experimentally Induced Convulsive Reactions of Laboratory Rats: II. A Comparative Study of Post-Convulsive Maze Behavior. *Edward Stainbrook, Duke University. J. Gen. Psychol.* 39:191-216, October 1948.

Electrically induced generalized convulsions produce changes in the rat's behavior which result in a relatively long-lasting post-convulsive reactivation of errors at choice-points in an already perfectly learned maze. Further, after there is evidence of spontaneous recovery from both electroshock and noise-fright reactions the error frequency in the maze performance of rats in which electrically induced convulsions have occurred is significantly greater than the error frequency in maze-swimming of rats which have been subjected to noise-evoked behavior disturbances.

Although electroshock convulsions produce severe maze performance dysfunction in rats, there is significant evidence of retention of maze experience even during the initial post-convulsive trial when the severe performance dysfunction is most manifest. That the disturbance produced in the rat by electroshock convulsions is primarily a transitory cognitive dysfunction is indicated by consideration of the fact that, following electroshock convulsions, rats which had not previous experience with the maze and which, hence, could have no retention disturbance of the maze experience made more errors than normally expected for original trials in the maze and took significantly longer to swim the maze to the escape platform.

The effects of 10 electroshock convulsions massed into a five-hour period were not reflected in time or in error scores in maze performances of rats in an already learned maze after 24 hours. On the other hand, the effects of such a convulsive experience were seen for at least two hours afterwards. It may therefore be assumed that electroshock convulsions, even when several are massed into a single half-day, produced in the rat only a temporary disruption of a well-established maze habit. No differential error or time effects exist between the two experimental groups of electroshocked and noise-frightened animals in their maze performance 30 days after their experience either with 10 daily noise-fright exposures or with 10 daily electroshock convulsions. In terms of error or time scores, no significant

effects of the experimental experience on maze performance was observed in either the electroshock or noise-fright group of animals 30 days after the last electroshock convulsion noise-fright reaction. 3 references, 11 tables

Therapeutic Conference. The Treatment of Epilepsy. *A. McGehee Harvey, Thomas C. Butler and John Magladery, Johns Hopkins Medical School.* Bull. Johns Hopkins Hosp. 82:601-614, June 1948.

The rational management of epilepsy depends on the separation of symptomatic seizures caused by brain tumors, syphilis, etc., from the "cryptogenic" variety. Only when specific causes can be excluded is it safe to proceed solely with measures to suppress the seizures. Such suppression is effected largely by drugs and by control of emotional factors. Secondary but important considerations are the avoidance of alcohol and of other situations wherein an attack would endanger the patient or others. Dehydration and ketogenic diets have infrequent usefulness in the modern therapy of epilepsy. Emotional and social rehabilitation is one of the key points in the proper management of epileptics. Such factors play an important role in the precipitation and the frequency of attacks. More serious is the impact of repeated attacks on the psychological development and adjustment of the individual to school, work and social situations.

The foundation of the control of epileptic seizures lies in adequate drug therapy. This means the use of the most effective drug or combination of drugs in sufficient dosage, the avoidance of drug reactions, and finally the exhibition of the material at the time most needed. All the drugs take a period of time in producing full clinical effect quite unrelated to rates of absorption and excretion. Secondly, the sudden withdrawal of one drug which is not achieving a completely satisfactory result, with or without the substitution of another, may initiate a striking recurrence of seizures—even precipitate a dangerous status epilepticus. A third point of value lies in the timing of dosage. The drugs of greatest usefulness are phenobarbital and dilantin. Bromides are not much used because of toxicity. Tridione has been successful in the suppression of petit mal and akinetic seizures, but it occasionally causes agranulocytosis and has other unpleasant side effects. Methods of animal screening have been improved and it is to be hoped that more potent and less toxic agents will be forthcoming. Animal experimentation has demonstrated also that a focal lesion of the cortex may give rise later to a generalized dysrhythmia, and secondly that cortical areas other than those of the motor cortex participate in motor phenomena.

### 5. Degenerative Diseases of the Nervous System

Senile Deterioration of the Central Nervous System. A Clinical Study. *Trevor H. Howell, St. Bartholomew's Hospital, London, England.* Brit. M. J. 4592:56-58, Jan. 8, 1949.

In 200 Chelsea Pensioners, known to be healthy, aged between 65 and 91 years, the following neurological findings were noted. The frequency

with which tendon reflexes were elicited decreased with age. In the whole series the ankle jerks were present in 30%, knee jerks in 77%, triceps reflex in 79%, biceps reflex in 87% and supinator reflex in 66%. As regards superficial reflexes, the plantar response was normal in 95%, while the abdominals grew more difficult to elicit with advancing years. The average for the whole series was just under 50%, lower abdominals being lost before upper ones as a general rule. Muscular power was retained well, even in the middle eighties, for the majority of those examined.

When sensation was tested, about a quarter of the men showed loss of either pain, temperature or touch, usually on the shins or forearms. It was unusual for all to be absent together and touch was lost less often than pain or temperature sensation. Vibration sense was in the upper extremity 95% or more. Shins registered in 74%, knees in 55% and ankles in 77%. The sacrum could perceive vibration in only 15%. Joint sense was usually normal in the feet, only 15% showing doubt. The nose touching test, however, revealed dysmetria of varying degree in over 40% of the pensioners. Half of these had both hands involved. There was difficulty in rotation of the wrists in 20% of the men and the percentage definitely increased with age from nil below 69 years to 44% over 85 years old.

The pupils reacted to light in 64% of cases, to accommodation in 44% and to neither in 36%. The failure to respond was more common as age increased for both reactions.

The third, fourth, fifth, sixth, seventh, eleventh and twelfth cranial nerves were normal in those examined. When such findings are present in old men who are known to be active and healthy, the possibility of misdiagnosis of neurological disease is not unlikely. 3 references. 8 tables.—*Author's abstract.*

Studies on Syringomyelia; on a Syringomyelic Syndrome with an Apparent Apoplecticiform Onset. (*Etudes sur la syringomyelie—Sur un Syndrome Syringomyelique à debut apparent apolectiforme.* Michel Y. Andre Bruxelles, Belgique. Acta Neurol. et Psych. Belgica 48:554-561, November 1948.

The author relates a clinical observation of a case of syringomyelia with real apoplectic-like onset. A subject with a heavily burdened vascular heredity noticed at the ages of 36 and 50, a sudden amyotrophy, first of the left hand, and next of the right hand. A neurological examination showed a syringomyelic type of dissociation of superficial sensation. There was no subjective evolution of these established clinical disturbances. There is a long report of a thorough neurological examination. The patient was submitted to Roentgen ray treatment. There are detailed accounts of regular check-ups on January 17, 1948, and February 26, 1948, and June 10, 1948. Then follows the discussion of the case. The author is unable to decide if the syringomyelic syndrome of the subject is exclusively of vascular origin

or the vascular accident revealed only, by aggravating a subjacent pathological process of a degenerative nature. There is the fact that the patient has a heavy vascular heredity: his father died at the age of 66 years from arteriosclerosis and his mother at the age of 67 years from albuminuria. But the patient did not suffer from high blood pressure and also there are no symptoms of evolutive arteriosclerosis; however, he had a microscopic hematuria. On the other hand, one finds little signs of *status dysraphicus*, thought there is a slight facial asymmetry and in inclination to the right of the head with a slight rotation to the left. The two points that make this clinical observation interesting and exceptional, are the suddenness of the amyotrophy of the hands and the astonishing slowness of its evolution. 10 references.

The Histo-Pathology of Pick's Disease as Compared with Other Involutional Mental Processes. (*La histopatología de la enfermedad de Pick frente a otros procesos mentales de involución.*) Chr. Jakob, Eduardo Pedace and Andrés R. Copello, *Hospital Nacional de Alienados, Buenos Aires, Argentine*. *Rev. Neurol. de Buenos Aires* 13: 1-9, No. 1-2, Jan.-Aug. 1948.

The results of the study of 30 brains from patients who had been diagnosed as having Pick's disease are here collected and commented upon. The frontal lobe was the part involved in 9 cases, the fronto-temporal area in 4, the fronto-centro-parietal in 2, the fronto-parietal in 2, the temporal in 2, the temporo-parietal in 1, the occipito-parietal in 1 and the centro-fronto-parieto-temporo-occipital in 1. In 7 the diffusion of the lesions was designated as simple.

In their study of this material the authors find that the lesions are not truly focal but tend to involve selective levels of the cortex. A typical and early predilection is that for the external, or receptor, cellular layers of the cortex. From this superficial diffusive location, the atrophic—later disintegrative, finally sclerotic—process progresses deeper and deeper through the layers of the cortex until it eventually involves even the centers and pathways of the mid-brain in the guise of atrophic and degenerative manifestations of the myelinated nerve fibers.

As a consequence of these anatomical changes the symptoms of the disease also exhibit a gradual progression. At first the power of attention is lost and the power of memory. When the lesions reach the deeper, or effector, layers of the cerebral cortex the powers of volition begin to suffer. This loss of the power of evocation affects both the external manifestations of volition, evidenced as muscular activity, effected through the internal capsule and the further continuance of the motor pathways through the pyramidal tract, and the internal manifestations of function of the limbic trigone. In fact, a complete synoptic panorama is erected in tabular form for Pick's disease. This classification divides the ambienal forms,

or forms with loss of external manifestations, such as the temporal, parietal and occipital agnosias and dysgnosias and apraxias, from the introyental forms, or those with loss of affective, or limbic manifestations, such as the affective dysgnosias of the inferior limbic and the supra-callosal affective dyspraxias of the dorsal limbic. Finally discussed are the combined, or poly-lobular, forms with poly-gnostic and poly-praxic losses of both ambient and introyental natures.

In this material the degenerative manifestations seemed to affect without preference both the older regions of the brain (paleo-cortex) and newer cortical areas, such as that of the frontal lobe. The blood vessels were not particularly affected, and this excludes the possibility of any senile etiology being in action in Pick's disease. The process is therefore believed to be an involutive and hereditary one. Its abiotrophic character is further proven by its bilaterally symmetrical character. 2 references. 8 figures.

The Influence of Hypnosis on the Tremor in Parkinson's Disease. *Frank A. Buell and J. Park Biehl, Veterans' Facility Hospital, Palo Alto, California.* Dis. Nerv. System. 10:20-23, January 1949.

Four patients with Parkinson's disease were individually subjected to from three to four hours of hypnosis prior to recording their myograms and encephalograms. In one case the tremor of the involved extremities could be abolished completely under hypnosis. This clinical observation was confirmed by an electromyogram taken during hypnosis. In another case the tremor was apparently improved under hypnosis as judged by observation, but was never entirely abolished. The electromyogram before and during hypnosis showed no significant change. In a third case the tremor was abolished during hypnosis for briefer periods of time than in either of the other two. No relationship was found between the cortical potential and the tremor of Parkinson's disease. No abnormalities were found in the electroencephalograms of patients with Parkinson's disease. Although the hypnotic state resembles sleep in many respects, in such states the electroencephalograms resembles that of the waking state. The hypnotic state does resemble sleep in that the tremor of Parkinson's disease can be abolished or diminished. Since the cortical activity is that of the waking state, it would seem that the tremor is from a subcortical lesion. 6 references, 2 plates.

Severe Rigidity in Performance and Thought in a Case of Presenile Degenerative Disease. *Morton Nathanson and S. Bernard Wortis, New York University College of Medicine, New York, N. Y.* J. Nerv. & Ment. Dis. 108:399-408, November 1948.

A case study is presented of a 49-year-old woman diagnosed clinically and anatomically as having a presenile degenerative disease (Pick's). Neuropsychological studies revealed a rigidity of thought and performance so

severe that bombardment with strong extraneous stimuli by different examiners at varying intervals over a four-month period failed to get her to perform outside of her fixed stereotyped pattern. The fixed pattern appeared to be more than what is implied by the term perseveration.

The onset of the mental condition two years before hospitalization was marked by impairment in memory, forgetfulness about household duties, restlessness and a gradual paucity of speech. Except for a vague history of an abscess in the left ear in 1942 her history revealed no significant illnesses or injuries, nor did the family history reveal anything of significance. Before illness she had according to description been alert, gay and rather intelligent. On admission to this hospital mental examination showed her to be reticent, docile and expressionless. There was complete lack of spontaneous speech, and echolalia was marked. In the ward she performed a repetitive routine having no apparent purpose. Emotional tone was flat except for bursts of childish laughter. The marked rigidity of performance was noted particularly in drawing and writing tests. No matter what she was asked to draw she invariably drew a face, usually a face within a square. When asked to write numbers she always began with the number 12 (12, 12, 13, 13, 13, 14, 14, . . .). During one interview she drew a horse but its face was identical with the other faces she drew, and once when persuaded to draw a house she drew in the window squares the identical face pattern. On the Kohs Block Test she repeated the same color pattern with four blocks regardless of the stimulus card placed before her and of the demonstrations by examiners. She never acted disturbed or startled when confronted with new tasks. On rare occasions when she could be persuaded to deviate slightly from this fixed set, the deviations were fleeting and she always resumed her stereotyped performance.

On autopsy the principal pathology was marked gross cortical atrophy in the frontal and part of the parietal lobes bilaterally. The corpus callosum and subcortical ganglia were involved to a lesser extent. From the standpoint of Goldstein's theory of primary and secondary rigidity, this case cannot be distinguished as being either primary or secondary but appears to be an expression of both. Despite the absence of supporting evidence it is possible that the pre-morbid personality and history may be contributing factors in determining the type of set into which this patient became rigid. 7 references. 7 figures.—*Author's abstract.*

## 6. Diseases and Injuries of the Spinal Cord and Peripheral Nerves

Electrodiagnosis In Peripheral Nerve Lesions. *Sam D. Graham (Lt., Junior Grade (MC) U.S.N.R.). U.S. Nav. M. Bull. 48:838-42, Nov.-Dec. 1948.*

The newer electrodiagnosis machines, with their rectangular wave galvanic current giving accurate reproducible data, have become a great aid in diagnosing and following the course of degeneration, denervation, and

regeneration. Many of Erb's original findings in his "reaction of degeneration" are still used in testing for nerve lesions, although his findings have been elaborated upon. If the history of time of injury is less than 1 or 2 months and the patient on examination shows a low rheobase, a moderately high galvanic tetanus threshold, a high tetanus ratio, a chronaxia above 15 milliseconds, the AR slightly greater than the CR, and discontinuities of the strength-duration curve, it can be said that degeneration is taking place. The patient should be followed at 10- to 14-day intervals to see if regeneration is going to take place. If the nerve has been severed and repaired, regeneration does not appear for at least 50 to 60 days. If there is a denervated state, one will find a low to normal rheobase depending upon the length of time since injury, a low galvanic tetanus threshold, a low tetanus ratio, a smooth steep strength duration curve, and the relationship of AR to CR varying. Such patients should be followed for the possibility that regeneration may subsequently take place. If a nerve has been damaged and signs of denervation persist then the patient should be explored surgically. In regeneration, one will see a normal to a high rheobase, a high galvanic threshold, a very high tetanus ratio, AR greater than CR, and discontinuities of the strength duration curve. The chronaxia may be very high when the patient is seen but as regeneration takes place, it will fall to normal. If there has been no repair of the nerve and the length of time since the injury is sufficiently long enough to expect the denervated state and the above signs are present, then it may be said that the nerve was only partially severed or injured. 11 references.

BAL Therapy of Severe Peripheral Neuropathies. *A. R. Farmanski, Birmingham Veterans Administration Hospital, Van Nuys, California.* Arch. Neurol. & Psychiat. 60:270-78, September 1948.

It is proposed that (1) neuropathies are initially biochemical disorders, chiefly disruptions of enzyme systems of the neurones, (2) the dysfunction so produced can be severe but the structural changes of degeneration need not occur, and (3) reactivation of these enzyme systems should result in rapid recovery. The dithiol 2,3-dimercaptopropanol (British Anti-Lewisite, "BAL") had been shown by many workers to have the ability to reactivate sulfhydryl enzyme systems in the heavy metal intoxications. The possibility of BAL reactivating enzyme systems in metabolic and infectious neuropathies was investigated. Four cases of severe motor and sensory neuropathy had not responded to large doses of vitamins and crude liver extract, three cases progressing to quadriplegia while on such therapy. The addition of BAL to the regimen resulted in prompt cessation of progression of neuronal dysfunction, rapid recovery in three cases and improvement in the fourth case. The BAL (10 percent solution in 20 percent benzyl benzoate and peanut oil) was given in doses of 1.5 to 3 mg. per kilogram once daily

intramuscularly for periods of 9 to 22 days. The possible mechanism was considered to be a conjugation of toxic metabolites which had inactivated enzyme systems of the neurones or an inhibition of enzyme systems of viruses. 11 references.—*Author's abstract.*

## 7. Electroencephalography

Electroencephalogram in Postencephalitic Behavior Disorder and Postencephalitic Parkinsonism. *Sidney Levin, Harvard Medical School, Boston, Mass.* Am. J. Psychiat. 105:439-42, December 1948.

It is well known that in acute encephalitis the E.E.G. commonly shows diffuse high voltage slow wave activity; but it has not been clear how often residual E.E.G. abnormality occurs in cases with post-encephalitic complications, although a high incidence of residual abnormality has been reported in patients who develop seizures. The present study pertains to the E.E.G. findings in cases with post-encephalitic behavior disorder and post-encephalitic Parkinsonism.

Of fifteen cases with post encephalitic behavior disorder, 13 (87%) had abnormal E.E.G.'s. Although a variety of patterns were observed most of the abnormalities were of a mild degree, with slow wave forms predominating.

In a series of 36 cases with post-encephalitic Parkinsonism, 11 (31%) showed E.E.G. abnormalities, which were all of a mild degree and primarily of the slow wave type, although considerable fast activity was also observed. The incidence of E.E.G. abnormality was essentially the same for cases with and without psychosis (31% and 30% respectively). There were 8 cases with oculogyric crises and of these only 3 had abnormal E.E.G.'s. 15 references. 1 table.—*Author's abstract.*

Factors Affecting the Electroencephalogram in Children and Adolescents. *Margaret A. Kennard.* J. Nerv. Ment. Dis. 108:442-4, November 1948.

In the present study of EEG's of 529 patients between the ages of six and 24 have been evaluated. No patient had signs of organic involvement of the nervous system. All were patients on the psychiatric wards at the time of EEG examination. The incidence of abnormality EEGs is related to age. In the ages six to seven, 81 per cent of records were abnormal; between the ages of 8 and 13, 66 per cent were abnormal; at 14 to 15 the percentage was 54, while above that, from 16 to 24 years, it remained at 46. Besides tension or anxiety, familial patterns found in EEGs also contribute to their patterning. Of 73 patients and 136 of their normal siblings, all without signs of nervous system abnormality, marked similarities of pattern were found in members of a single family. Finally, re-examination of records over a period of years in a group of 81 patients without organic involvement of the nervous system indicates some organization or improve-

ment of EEG patterning with age. The tendency to better patterning of EEG is definitely augmented as a result of shock therapy. It would seem that the EEG is an objective record of organic changes within the cerebrum which are physiologically and chemically ordered. As such, it cannot be expected either to diagnose clinically, or to correlate with the psychological traits of neuroses, psychoses or normal personality structure. But, as a psychological instrument, it should be useful as an aid in the understanding of psychiatric processes, particularly in children, for various reasons: (1) The presence of an abnormal EEG in a child who has no traits suggesting epilepsy or other disorder of the nervous system should be suggestive of an early and deep-seated disorder of behavior. (2) The distorted record may be the result in part of tension or anxiety, and one which is unusually responsive to environmental stimuli. (3) The data at least suggest that after shock therapy, fear, tension, anxiety are less effective upon the organism, and that the EEG is a sensitive indicator of this.

Encephalographic Investigation of Psychiatric Patients. *A. Haugen and J. Hove, The Oslo Municipal Hospital, Ullevaal, Norway. Acta Psych. et Neurol. 23: No. 1/2, 79-93, 1948.*

These tests proved useful in diagnosing true epilepsy, epileptiform symptoms and head injuries. Full correlation with clinical findings was obtained in 62 per cent of subarachnoidal and 42 per cent of subdural infusions (positive plus negative results); incomplete information, in 17 and 55 per cent; doubtful records, 20.5 and 3 per cent. 2 photos. 1 table. 9 references.

## 8. Head Injuries

Diabetes Insipidus Following Closed Head Injury. *R. J. Porter and R. A. Miller, Radcliffe Infirmary, Oxford. J. Neurol., Neurosurg. & Psychiat. 11:258-62, November 1948.*

Eighteen cases of diabetes insipidus following closed head injury have been studied and the relevant features tabulated. In 15 in which the site of injury could be determined it was frontal or occipital. The symptoms were usually first noticed during the second or third week after injury. The degree of polyuria and polydipsia may at first be mild, and may reach the maximum days or even weeks later. All cases treated responded to pituitrin. The course of the disease varied in severity and duration. The majority, eleven recovered spontaneously within 9 months of the onset. Injuries to the olfactory nerves and optic chiasm or nerves were striking in their frequency. More than half suffered from bilateral anosmia, 5 had visual field defects characteristic of a chiasmal lesion, and one had damage to the right optic nerve. No other signs of focal intracranial damage were

common, and evidence of hypothalamic disorder, other than diabetes insipidus, was uncommon. It is thought probable that the lesion is most commonly in the pituitary stalk, owing to stretching from displacement of the brain at the time of injury, and that the duration of symptoms and severity of the diabetes insipidus may depend on the extent of neuronal damage in the supra-optic-hypophyseal tract. The rarity of other hypothalamic syndromes and of permanent refractory diabetes insipidus is probably owing to the high mortality rate from more extensive injury to this part of the brain. 30 references, 1 table.

## 9. Infectious and Toxic Disease of the Nervous System

Dementia Resulting from Measles Encephalitis in Early Childhood. Contribution to the Problem of Dementia Infantilis /Heller/. (*Demenz als Folge von Maserencephalitis im Kleinkinderalter. Zugleich ein Beitrag zur Probleme der Dementia infantilis* /Heller/). G. Bosch, *The City Neurologic Clinic of St. Getreu, Bamberg, Germany*. *Nervenarzt* 19: No. 6, 254-64, June 1948.

Transition from babyhood to childhood (preschool), somewhere between the ages of three and four, marks a brief retardation of physical and mental development, which is soon succeeded by a spurt of growth at an increased pace. Under pathologic conditions, however, this retardation phase is prolonged and, if not remitted, becomes stationary, then regresses to high grade dementia. Other factors, besides direct pathology, include a congenital lack of stability, as well as excessive emotional strain due to poor environment. All these influences, however, appear as secondary, and not primary, etiologic factors.

The syndrome is easily differentiated from other types of children's dementia, since it is confined to a limited age interval, the involution follows a certain characteristic course, the mental regression proceeds alongside of continued growth and physical well-being. Absence of neurologic symptoms is another common feature of this disorder.

In the 2 cases reported (boy and girl, both 6; anamnesis and family history negative) the change of personality began with an altered reaction to the environment (loss of interest in objects and people, either children or adults). Next came speech difficulties: incoherent or unintelligible sentences, mispronunciation of words, etc., leading finally to mutism. This intensified the tendency to isolation. The life-pattern gradually lost its normal purposeful orientation (monotonous preoccupation with but a few toys, unimaginitive playing; movements reduced to a minimum in a latter stage). The inhibitory state (stupor) alternated with spurts of disoriented activity (aimless running around; later on merely rocking of the body, head or limbs). This was due to the lifting of inhibitions. Self-preservation, however, persisted to the end (attention to the eating and

sleeping routine, recognition of teachers and physicians, orientation as to place). The parts of intelligence phylogenetically first to develop were retained the longest. Music or singing produced a ready response (following the tune, swinging to rhythm) and an affectionate interest in the performer. Pleasant features, intelligent expression, graceful carriage, manual dexterity are typical for this illness (deceptive symptoms). Orderliness and neatness were likewise preserved (incontinence did not develop until the ultimate stage of regression). 19 references.

## 10. Intracranial Tumors

*See Contents for Related Articles*

## 11. Neuropathology

Pathologic Anatomy of Schizophrenia (*Zur pathologischen Anatomie der Schizophrenie*). E. Frey, Zurich, Switzerland. Aerztl. Mhefte, Schwarzenburg 4: No. 4, 333-46, 1948.

Microscopic study was carried out on brains obtained from catatonics, 23, 26 and 30, with no mental illness in the family history, except in one case (an aunt suffering from paranoia). A case of encephalitis lethargica, 28 (clinical symptoms of acute catatonia with secondary encephalitic manifestations) was used as control.

Organic lesions were found in all 4 cases. The basal ganglia and the substantia nigra showed degeneration of the blood vessel walls (adventitia), infiltration of the perivascular cells, neurogliophagia and liberation, as well as decrease, of the pigment. In spots fatty degeneration of the ganglia was seen, as well as numerous hemorrhages caused by the break-down of the vascular walls. Other impaired areas included (in the 3 schizophrenics) the frontal and parietal lobes (cortical layer). In one case the temporal lobes were also affected, in another destruction of the Nissl rods in the cells was noted, together with signs of leptomeningitis in the mesodermal nerve tissue, resulting in hemorrhages. Where the damage in the cortex was most extensive (2 cases), the cerebellum too appeared abnormal (complete disappearance of the Purkinje cells). Unequal progress of the disease in the two hemispheres was characteristic in all instances. The thalami, stems and medulas oblongatas, as well as the remaining parts of the cortex, were normal (including the control).

The author believes that catatonia results from inflammatory condition of the frontal, central and/or temporal cortical tissue, due to infection toxins. 29 references.

Does Epileptic Dementia Result from Ammon's Horn Dysfunction? (*Sind die Demenzzustände der Epilepsie bedingt durch Ammonshorn Ausfälle?*) P. Imhoff, University of Walden-Bern, Switzerland. *Mschr. f. Psych. u. Neurol.* 116: No. 3, 157-84, Sept. 1948.

In the studied material (14 cases of severe epilepsy with fatal outcome and high incidence of the explosive irritation syndrome) 6 patients (43 per cent) showed symptoms of pyramid dysfunction in the Ammon's horn zone. Autopsy revealed thickening of the glia layer in the cerebral cortex and a certain parallelism between the degree of psychosis and the size of the destroyed area. There was, however, no microscopic or clinical evidence relating the tissue destruction in the Ammon's horn to the dementive symptoms. Hence, the slow, chronic type of destruction, even when bilateral, as in these cases, does not cause directly elimination of the pyramidal functions. Epileptic dementia may be thus differentiated from certain other forms of this condition resulting from acute destructive processes in the pyramids. 33 references.

Infantile Cerebral Hemiplegia—Clinical Features and Pathological Anatomy. Roy MacKenzie Stewart, F.R.C.P. (*Edin. & Lond.*). *Edinburgh M. J.* 45:488-505, August 1948.

A report is presented of 112 cases of cerebral hemiplegia exhibiting almost exclusively the features of the disease as portrayed in adult life when the condition had become stabilized. Fifty of these cases were males, and 62 females. Right hemiplegia occurred in 61 and left hemiplegia in 51. In 102 cases, or 91 per cent, the hemiplegia was either congenital or occurred during the first 3 years of life. In the present series a history of normal labor was obtained in 26 cases, or 23 per cent, a figure sufficiently large to uphold the claim that birth injury plays an important part in the etiology of the asymmetrical palsies of childhood. The connection of infantile hemiplegia with congenital syphilis is usually held to be remote, but the presence of congenital syphilis in 9 of the above cases is not altogether in accord with such a view. The earlier in life the hemiplegia is sustained, the more serious will its effects be on the growth of intelligence; and the nearer the age approximates to the period when the brain has ceased its development—about the seventh year—the less the interference with intelligence.

It would appear that final conclusions cannot be reached concerning the cause of the hemiplegias that are seen in children previously in good health. It is evident that no uniform type of lesion is to be found and that for the encephalitic theory anatomical evidence is almost entirely lacking. In the few reports on autopsies reported on recent cases hemorrhages and softening predominate, but only in a minority are organic changes in the vessels discovered. Whether lesions of so extensive and grave a character

can be caused by functional disturbances of the circulation, such as have been postulated by De Vries and Bouman, is a question which must be left for future research to decide. 31 references, 6 tables, 6 figures.

**Metastatic Tumors of the Central Nervous System. I. Intracerebral Metastases As the Only Evidence of Dissemination of Visceral Cancer.** *Charles Rupp, Philadelphia General Hospital, Philadelphia.* Arch. Neurol. & Psychiat. 59:635-45, May 1948.

In a series of 6,000 autopsies of the brain performed at the Philadelphia General Hospital, metastatic tumors comprised 27.2 per cent of neoplasms of the nervous system. The high incidence of metastatic lesions is attributed to the fact that the autopsy material was derived from all services in a large general hospital.

In 42 cases the primary neoplasm is extremely small and is observed at autopsy only after careful search; in others a primary tumor cannot be identified even after a careful autopsy. In such cases a correct clinical diagnosis of the metastatic nature of the intracranial lesion is impossible.

Carcinoma of the bronchus or lungs is the most frequent primary source of a discrete intracerebral metastatic tumor. Carcinoma of the breast, uterus, ovary and liver, as well as neurogenic tumors of the adrenal gland may give rise to similar metastases. There are not characteristic clinical symptoms distinguishing intracerebral metastatic tumor. The onset may be abrupt or slow. Focal neurologic signs are usually present and may be associated with mental disturbance. In a few cases mental disturbance alone occurs. Evidence of increased intracranial pressure may or may not be present. Cachexia and wasting are often inconspicuous or absent. The intracerebral metastatic lesions may be solitary or multiple and occur in all areas of the cortex, cerebellum and brain stem.

A correct clinical diagnosis of the metastatic nature of an intracerebral lesion is difficult unless the primary neoplasm gives rise to symptoms. A careful, detailed roentgenographic examination of the chest should be made in all persons 40 years of age or older who present evidence of an intracerebral lesion, and such a study may be of diagnostic help if the primary tumor is in the bronchus or lungs. A negative roentgenogram of the chest does not preclude the possibility of the intracerebral lesion being metastatic, since the primary tumor, if in the lung, may be too minute to be detected in a roentgenogram. A roentgenogram of the chest is of no diagnostic aid when a primary tumor located elsewhere in the body gives rise to metastases located only within the brain.

## 12. Neuroradiology

*See Contents for Related Articles*

### 13. Syphilis of the Nervous System

Unrelated Neurologic Syndromes in Patients with Syphilis. *E. R. Maillard, New York State Department of Health, New York, N. Y.* Arch. Neurol. & Psychiat. 60:297-300, September 1948.

Abnormal findings in the cerebrospinal fluid from patients with neurologic syndromes and a history of syphilis and whose blood reacts in the complement-fixation test for syphilis may be incorrectly interpreted as evidence of neuro-syphilis. Such erroneous conclusions may be avoided by the application of laboratory tests quantitatively standardized to yield accurate and reproducible results. Tests should include cell count, total protein determination, colloidal gold reaction of the cerebrospinal fluid, and quantitative complement-fixation tests of cerebrospinal fluid and blood. The results of the tests of cerebrospinal fluid should have quantitative relationship to each other so that the findings can be correlated and classified in accordance with the type of syndrome represented.

There is evidence to indicate that the reagin in neurosyphilis is formed within the central nervous system, and that in pathologic conditions involving the vessels of the central nervous system alteration of permeability and admixture of plasma with cerebrospinal fluid may result. If the reagin titer of the blood is relatively high, even though the neurologic process is unrelated to syphilis, enough plasma may gain access to the cerebrospinal fluid to give a reaction with the complement-fixation test for syphilis. Evidence of this alteration of permeability and of admixture of plasma with cerebrospinal fluid will be indicated by the type of syndrome, and will permit a correct interpretation of the reaction in the cerebrospinal fluid. Similarly, if the neurologic process is related to syphilis, the syndrome will reflect the activity and character of the syphilitic inflammatory process. Two cases in which complete studies were made are discussed. 3 references. 2 tables.—*Author's abstract.*

### 14. Treatment

The Treatment of Pneumococcal Meningitis. *John Kershman and Eric Peterson, Montreal Neurological Institute, Montreal, Que., Canada.* Canad. M. A. J. 59: 527-31, December 1948.

The clinical data of 12 cases of pneumococcus meningitis are presented: 6 patients had had a recent ear or mastoid infection, 3 a recent head injury and 2 an old head injury. Early recognition and treatment of this primary site is considered as important as chemotherapy. In all cases the cerebrospinal fluid was abnormal and pneumococci were grown from the cultures. Sulfonamides were maintained at a blood level of approximately 15 mgm.% of free sulfonamide by using an average initial dose of 2 grams

and 1 gram every few hours thereafter. In four instances sulfonamides were given intramuscularly and intravenously. All patients were given 5,000 to 100,000 units of penicillin intramuscularly every three hours. In 9 patients penicillin was also given intrathecally, and in one patient intraventricularly. Not more than 10,000 units at a time, diluted in 10 cc. of normal saline, was deemed the best method of intrathecal administration, once or twice daily. It should not be given in the presence of a traumatic, "dry" or otherwise unsatisfactory spinal puncture. Chemotherapy is continued till the temperature remains normal for at least 3 successive days. Of major importance is the prompt treatment of the primary focus of infection. Radical mastoidectomy was carried out in 4 instances, paracentesis in 1 case, and sinus irrigation in 3 cases; these procedures were done as soon as possible after diagnosis was made. This requires the active cooperation of otolaryngologist and neurosurgeon during the course of treatment. The importance of general nursing care is also stressed. Of the 12 patients so treated, 10 made a complete recovery, 1 patient remained with a transverse myelitis and mental deterioration, and 1 died. The death resulted from bronchial obstruction caused by aspiration of mucus and sanguineous discharge following mastoidectomy and endonasal antrotomy in a 73-year old man. 2 references.—*Author's abstract.*

Treatment of Cerebral Palsy. *Robertine St. James, R.P.T., The Children's Rehabilitation Institute, Inc., Cockeysville, Md.* Phys. Ther. Rev. 28:102-6, May-June 1948.

Not all the modalities, that is, methods of application of physical therapeutic agents, are indicated in the treatment of cerebral palsy. Because of its singular nature, 15 modalities have been selected as being directly applicable to the needs of the brain injured group. These are massage, passive motion, active-assistive motion, active motion, resisted motion, conditioned motion, confusion motion, combined motion, rest, relaxation, motion from the relaxed position, balance, reciprocation, reach and grasp, and skills. The sequence of these modalities follows a logical pattern in that massage precedes passive motion, active motion precedes resisted motion and reach and grasp precedes skills. It is important, however, to combine these technics in treatment according to the muscle picture of the individual child. For instance, one child may need massage and active-assistive motion to the gluteus medius, relaxation to the adductors, resisted motion to the quadriceps, confusion motion to the anterior tibial, leg reciprocation, trunk or total body balance and reach and grasp for the lead arm and head. Obviously, then, the success of a treatment program depends upon an accurate diagnosis, the correct interpretation of the whole muscle picture and a sensible selection of technics necessary to the improvement of those muscles. 2 references.

### 15. Book Reviews

Psychiatry In General Practice. *Melvin W. Thorner*. W. B. Saunders Co. Phila. 1948. 659pp.

With scientific approach, "this book is written primarily (for) the internist and general practitioner", one or the other of whom usually first sees patients with disturbances of personality. Under the chapter headings of *people—intelligent, dull, unhappy, dementing, confused, dreamy, anxious, suspicious, queer and twisted, etc.*, the author presents detailed case records of patients just as they are likely to be observed by practitioners. There follows discussion as to the meaning of the abnormal personality, primarily as a dynamic interpretation of the mechanism of the disturbance. The point of view is objective, namely, the facts, the interpretation of the facts, and finally, the means and methods of therapy. Noteworthy is the insistence upon the complete evaluation of the patient; too often psychiatrists are critical of the failure of practitioners to detect emotional difficulties, but conversely they themselves may overlook physical illnesses. The ideal is to determine what is wrong with the individual, who is likely to be impressed by, and to be more cooperative after, a complete study.

Chapters 16, *The Aim of a Psychiatric Examination*, and 17, *The Physical Examination and Special Methods*, must be read completely to be fully apprehended. One line should be noted by every physician: "In most instances the psychiatric patient has more to tell the doctor than the latter has to tell the patient". The four chapters on therapy are splendid, since they summarize concisely what the practitioner should know as to therapeutic problems and what he should tell patient and family.

The style is easy and delightful, with occasional sly bits of humor. Only two errors are noted: On page 300 the date should be 1833 instead of 1883; on page 623 approach is misspelled.

This is one of the best books written to date to present psychiatry in non-technical language; it may be read with pleasure and profit by every practitioner of medicine, even by radiologists.—*Charles R. L. Halley, M.D.*

Basic Principles of Psychoanalysis. *A. A. Brill, M.D.* New York, Doubleday & Co., 1949. 298 pp. \$3.45.

This posthumous work of the late Dr. Brill is a revision of his *Fundamental Conceptions of Psychoanalysis*, published in 1921. After Dr. Brill's death, Dr. Philip R. Lehrman added some finishing touches and brought the volume to publication. The book is addressed primarily to the layman, as was the original edition, which was based on material for an elementary course in the department of pedagogics of New York University. The present edition follows essentially the same style, general presentation of the subject, and chapter organization, and often the same illustrative examples.

In a simple, chatty style, the author presents the thesis that "all unconscious mentation is motivated fundamentally by the wish." After a brief historical chapter on the development of psychoanalysis, the author builds up evidence of unconscious mental activity as displayed in everyday slips, forgetting, wit, and symptom formation. It is emphasized that these mechanisms are not limited to the neurotic. The three chapters on dreams amplify the concept that the dream is a concrete visualization of a hidden wish, "is a hidden fulfillment of a repressed wish." A chapter on the more common psychoses would have been better left out. Like other parts of the book, it is far too oversimplified and overgeneralized. It is not up to date and often repeats the Kraepelinian hopeless concept of dementia praecox. In fact, the essential difference between schizophrenia and manic-depressive psychosis is stated in terms of recovery (p. 223). A dogmatic tone and overgeneralization are also evident in the chapters on "The only Child," "Fairy tales and artistic productions," and "Selection of vocations."

On the whole, the book is very easily read because of its conversational style, use of everyday analogy, and anecdotes and stories. Although psychiatrists will not find the book particularly useful to themselves, this presentation by America's first psychoanalyst can be recommended to the interested layman.—*Norman Taub, M.D.*

*The Battle of the Conscience. Edmund Bergler, M.D.* Washington Institute of Medicine, Washington, D.C. Monumental Printing Co., Baltimore, \$3.75.

This book contains mainly a series of papers previously published by the author in various psychiatric magazines, but brought together in a manner which would impress the casual reader as material that had all been written for the book.

The formulations of the author are those of orthodox psychoanalysis, assuming there is any such thing at the present time. The author, in general, follows Freud in his formulations and seeks to bring other theories into Freud's special theories. For example, on Page 14, we are told:

"'Feeling of inferiority' is an Adlerian misnomer and simplification.

It simply means 'feeling of guilt,' and confuses the outward manifestations and rationalizations with the real problem, which is unconscious."

The author starts out with discussing the Origin of the Pre-Stages of Conscience. His formulation, while Freudian, seems to be in general agreement with the biological observations of others.

As one reads through the book, there is the development of Freud's theory of Eros and Thanatos and of the Ego, Id and Super-Ego. This is done in quite orthodox fashion and with little deviation from Freud's ideas. There are, however, many references to others who have deviated to a greater or a lesser degree from the way Freud has formulated matters.

There are many references to the writings of great poets and novelists which are used to illustrate the points the writer wishes to bring out. The material is clearly and interestingly presented. The author makes an excellent argument for his theories.—*Karl M. Bowman, M.D.*

*The Psychoanalytic Reader.* An anthology of essential papers with critical introductions. Volume I. Edited by *Robert Fliess*. New York, International Universities Press, Inc. 1948. 392 pp. \$7.50.

Anthologies have long been useful teaching devices in the social sciences and literature. This present anthology answers a long-felt need in the field of psychoanalysis. Dr. Fliess has undertaken to compile representative important psychoanalytic papers which have not been previously organized into collected works of the authors. Such a task is obviously a long-range project and is to be published in a series of volumes. This book is Volume I in the projected series. Some of the articles brought together in the anthology have not previously been translated into English or are otherwise not readily accessible to the average student of psychoanalysis. In his foreword the editor states the principles determining the selection of papers: the broad criterion is that the papers contribute to the theoretical formulations and the clinical data of psychoanalysis.

There is little room for comment about the editor's selection of papers included in this first volume. In view of the volumes to come in the series, there can be no criticism regarding omission of papers. Fourteen articles are organized under three broad section headings, *Clinical*, *Theory*, and *Miscellaneous*. Subheadings, each with two or more papers, are "Neuroses," "Psychoses," and "Characterology" (consisting of three articles by Wilhelm Reich), in the *Clinical* section. Under *Theory* is the subheading "Female and Preoedipal Sexuality," which includes three contributions by Helene Deutsch. There are six rather short papers by Karl Abraham which are not included in his collected works. At the end is a brief section entitled *References by Freud*, in which are six short papers or excerpts on dreams preceded by Freud's references to them. Except for the last section, each article is preceded by the editor's introductory comments. The editor has also incorporated a graphic ontogenetic table or "chronological chart of the principal stages in the development of the psychic apparatus." On the whole, the selections, the comments, and the orientation of the book are what is now referred to as orthodox Freudian psychoanalysis.

This book, with the volumes to follow, will find its greatest usefulness as a sourcebook for students of psychoanalysis.—*Norman Taub, M.D.*

*Which Way Out?* By *C. P. Oberndorf, M.D.* International Universities Press. N.Y. 1948. 236 pp. \$3.25.

One of the senior psychoanalysts of the United States here presents in short story form some of the problems which come to the attention of the

psychiatrist. Dr. Oberndorf has demonstrated long before now his literary ability, which he now utilizes to make clear to the lay reader some of the "psychopathology of everyday life" as well as of some acute neurotic complaints.

The stories are well told, the situations are interesting, and the solutions, though in some ways oversimplified (they always must be in the short story), are entirely within the bounds of psychiatric probability.—*Winfred Overholser, M.D.*

The Clinical Application of Psychological Tests. *R. Schafer*. International Universities Press, Inc. New York. 1948. 346 pp.

Intended as a sequel to the two volumes of *Diagnostic Psychological Testing* (by Rapaport, D., Gill, M., and Schafer, R.) the present book consists of two major divisions: 1) a description of outstanding characteristics of individual syndromes as related to psychological test findings; and 2) discussions of concrete case studies.

In the section on diagnostic summaries, each syndrome is presented separately and the pertinent diagnostic indications reviewed test by test. Included in the list of diagnostic categories are: obsessive-compulsive neurosis; hysteria; mixed neurosis; neurasthenia; anxiety state; narcissistic character disorder; neurotic and psychotic depression; schizophrenia (in general); unclassified schizophrenia; paranoid schizophrenia; simple schizophrenia; schizophrenic characters; incipient schizophrenia; schizoid character; paranoid character; the normal personality. The six tests covered are the Wechsler-Bellevue, Learning Efficiency, Sorting Test, Rorschach, Word-Association, and Thematic Apperception Test.

Ten complete case studies are reviewed following the order of verbatim test responses and scoring, analysis of each test, a general diagnostic test report, and a clinical summary. Ten briefer case studies are also given, similarly organized, but with one or more of the six tests omitted.

As the author indicates, no attempt was made to integrate test data with clinical findings, to present an over-all clinical picture of the individual, or to relate test results to prognosis or therapy. Also, it may be noted, several major diagnostic categories were omitted: manic, catatonic and hebephrenic schizophrenia, involutional psychoses, and all types of organic cases. Although the normal personality is discussed in the general section, the nearest approach to such an entity included in the case studies is that of an inhibited normal. Even though an example of every type of diagnostic syndrome could not be included, it is to be regretted that those omitted are the ones generally excluded from test literature although frequently encountered in clinical practice.

Despite probable disagreements with some of the author's hypotheses, test interpretations, and type of cases selected, clinical psychologists, as well as those in allied professions concerned with diagnostic analysis, will find

the book of definite value. It is important, not only as a source of illustrative case material for a battery of psychological tests, including verbatim records, but also as an example of the interpretation of test results in terms of behavior characteristics rather than syndrome labels.—*Claire Myers Vernier, Ph.D.*

Personality Projection in the Drawing of the Human Figure. *Karen Machover. Charles C. Thomas. Springfield Ill. 1949. 194 pp. \$3.50.*

The significance of this book hinges upon the validation of the basic hypothesis upon which it is developed, viz., that drawings of the human figure represent projections of the subject's own attitudes, particularly his conception of the body image. To be sure, there has been general validation, by Allport and others, that all expressive movements, whether in gait, gesture, or handwriting, reveal intrapsychic tensions, conflicts, and formulations, compensatory or otherwise, of the Ego role. To this extent the body-image of the individual may reasonably be expected to emerge in response to the directive to "draw a person." Where validation is specifically lacking is in regard to the meaning to be attached to any given detail, for instance, that a concave mouth indicates fixation at the oral level, that buttons signify mother-dependence, and elongated feet or a conspicuous neck-tie are phallic symbols. In general, psychoanalysis, of which such drawing interpretation must be considered at least in part derivative, has escaped from its bondage to fixed symbols. While formerly all long, narrow objects—swords, guns, sceptres, etc., were wont to be accepted as symbols of the male sex organ and all broad objects—bowls, boxes, rooms, etc., as symbols of the female genitalia, no longer are such generic meanings accepted. Instead, there has been a growing realization of the extremely individualistic language of symbolization.

Long antedating psychoanalytic doctrine, however, are the theories of constitutional typology which in our own culture may be traced from the speculations of Hippocrates and Galen through the French, German, Italian and Swiss schools to the recent work of Sheldon in this country. Running through them all is the assumption that physique and character are inextricably related. Tending to substantiate these typological theories, essentially akin however differently verbalized, we find an underlying belief of men everywhere that certain specific features are expressive of significant personality traits,—thin, compressed lips of cruelty, a broad forehead and well-spaced eyes of frankness, generosity and nobility, a strutting gait of braggadocia. Upon the virtually universal acceptance of such "stereotypes" do literature and drama depend to convey meaning swiftly and economically.

Given such consensus as to the meaning of various physical features on the one hand, and the psychoanalytical concept of projection and symbolization, with such general psychological validation as has been given to "expressive movement", on the other, the twin supports upon which this experimental drawing technique rests become clear.

The book itself should be regarded only as a progress report. Recently it is stated that research is going on to answer questions as to the constancy of projection, the significance of mood, and, through the use of associative material, the meaning to the individual of the stereotypes employed. To date the chief validation, as in psychoanalysis, and in such other projective techniques as the Thematic Apperception Test, has come from success in personality evaluation and diagnosis especially in so-called "blind" analysis and from the improvement following treatment based upon it. The detailed presentation of the interpretive concepts utilized by the writer gives other workers an opportunity to test their usefulness and thus the publication of the book at this time seems justified.—*Isabelle V. Kendig, Ph. D.*

Neuroanatomy. *Fred A. Mettler, A.M., M.D., Ph. D.*, Associate Professor of Anatomy, College of Physicians and Surgeons, Columbia University, New York. Second Edition. The C. V. Mosby Company, St. Louis. 1948. \$10.00.

Since the appearance of the first edition of this book in 1942, it has become an extremely popular text on the anatomy of the nervous system.

The general arrangement of the subject matter follows that of the previous edition, part one dealing with the gross aspects of the neural system and part two with the microscopic anatomy. Sections have been added on the spinal mechanisms of micturition, regeneration of axons, reticulospinal systems, physiology of the extrapyramidal systems, etc. Sections on arterial supply and venous drainage of various parts of the neuraxis have been extensively revised and enlarged.

The arrangement of the text in some ways remains rather desultory. For example, the gross anatomy of the cerebellum is described in Chapter VII. There is no corresponding chapter on microscopic anatomy, part of the chapter on the medulla oblongata being devoted to that topic. The physiology of the cerebellum is discussed in the chapter on the midbrain. It is difficult to understand why the topics entitled audition, vestibular function and the trigeminal nerve should also be included in the chapter on the midbrain. The organization of the text is such, however, that no new terms are employed at any place without having been previously defined.

Although the author has not attempted to give a full account of neurophysiology, the functional viewpoint has been emphasized and clinical correlations have been made from time to time. On the whole the text makes slow and laborious reading.

The illustrations are no less than superb. Many illustrations have been added to the present edition. Practically all of the figures were specifically made for this book from original material dissected or otherwise prepared by the author. The various structures portrayed are abundantly labeled.

The microscopic anatomy is particularly well illustrated by myelin sheath preparations and Nissl sections placed side by side. Two-color plates are used in depicting the vascular arrangements.

An extensive list of selected references is given for each chapter. The index is quite complete.

The author says that he has written the book to meet the needs of the medical student beginning instruction in neuroanatomy. In the reviewer's opinion the text is too detailed to serve this purpose well. The book is an excellent reference work and for that purpose can be highly recommended.  
—George D. Weickhardt, M.D.

Functional Neuro-Anatomy. *A. R. Buchanan, M.D.*, Professor of Anatomy, University of Colorado School of Medicine, Denver, Colorado. With 199 Illustrations, 19 in Color. Lea and Febiger, Philadelphia, 1948. 242 pp. \$6.50.

The present text is the outgrowth of a mimeographed syllabus previously available to the author's classes in neuro-anatomy. The book is not intended to be an exhaustive presentation of neuro-anatomy and neurophysiology. It is designed, rather, to present the subject matter in as simple and direct a manner as possible.

The material is quite well organized. A functional approach is used and abundant clinical illustrations of a highly practical nature are made from time to time in the body of the text.

The book is abundantly illustrated with original semi-diagrammatic line drawings. One wishes that many of these drawings were larger and that colored (rather than black) lines were used more extensively to indicate various neural pathways.

For those beginning the study of neuro-anatomy and for those wishing a simple but comprehensive review of the subject, the book can be highly recommended.—George D. Weickhardt, M.D.

Nursing Care of Neurosurgical Patients. *Roland M. Klemme, M.D.*, F.I.C.S., F.A.C.S. Charles C. Thomas. Springfield, Illinois. 1949. 142 pp.

There is probably no surgical specialty in which intelligent and competent nursing care is so essential as in the field of Neurosurgery. At the same time, however, every neurosurgeon and every nurse's registry is aware of the difficulties in finding nurses to give this type of nursing care. Many nurses otherwise well-trained and well-qualified refuse Neurosurgical cases conscientiously as they feel they do not have sufficient knowledge or experience to accept responsibility for the neurosurgical patient. In addition, the complaint is frequently voiced that there is no book which could serve as an outline or guidebook to the *nursing* aspects of Neurosurgery. Dr. Klemme has at last provided the nursing profession with a book to meet this need.

Nurses have complained that Neurology is too complicated and technical for them to feel competent in the field. In this thin volume Dr. Klemme has provided in outline form the salient features of the care of the neurosurgical patients and has omitted the maze of technical discussion. The most important attribute of this book is its emphasis on the practical. It tells what to do and why. Its division of material is logical and the excellent appendix should prove most useful.

The introductory section on Anatomy and Physiology is concise, clear, well-illustrated, and deals only with the most important aspects from the viewpoint of the nurse. The next portion of the text deals with the important signs and symptoms as evidenced by the neurosurgical patient and it is here that the only serious defect of the book is obvious.

The book badly needs a glossary of neurological terms. This fact is especially evident in the discussion of signs and symptoms. As the publisher states on the dust jacket, "The Neurosurgeon depends to a great degree on the constant, reliable, and intelligent observation and the prompt report of symptoms and complications, for the successful outcome of surgical procedures." Dr. Klemme has presented the major signs and symptoms in a clear and understandable way when any definition is given but he frequently uses specialized neurological terms (e.g. contralateral hemiparesis) without further definition or explanation. A few pages of glossary added to the appendix giving the definitions of the more common neurological terms would greatly increase the effectiveness and usefulness of the text.

In the succeeding sections of the book devoted to specific neurosurgical operations and conditions the emphasis is constantly on the practical nursing measures to be carried out for the comfort and welfare of the patient. Because of its attention to detail and its down-to-earth treatment of the nursing responsibilities it constitutes literally a handbook for the care of the neurosurgical patient. One especially good feature is the actual enumeration of supplies, instruments, and equipment needed for the various examinations, operations, and treatments. The more specialized instruments are illustrated. Especially notable are the diagram and explanation of tidal drainage and the operating room floor plans for neurosurgical operations.

This book fills a definite need in the library of any nursing school or hospital and should prove invaluable as a text for nurses specializing in neurosurgical procedures. It is especially recommended for the operating room and surgical ward supervisors of hospitals caring for neurosurgical patients. With the addition of an adequate glossary it should prove invaluable to private duty nurses in providing them with the type of information they need before assuming the care of the neurosurgical patient and it provides that material in the most readily assimilable form for their purposes.  
—C. William Bushnell, R.N., B.A.

Neurological and Neurosurgical Nursing. *Gutierrez-Mahoney and Carini*, C. V. Mosby Company, 1949. 516 pp. \$5.75. Reviewed by: *C William Bushnell*, R.N., A.B., Instructor, School of Nursing, St. Elizabeths Hospital, Washington, D. C.

Dr. Guierrez-Mahoney and Miss Carini have supplied the nursing profession with a much needed definitive text-book of neurological nursing. Because of its wealth of detailed material and its emphasis on specific measures of nursing care it also should prove a vital addition to the reference library of every nursing school especially for those in hospitals which provide limited clinical experience with neurological and neurosurgical conditions.

Written in a clear lucid prose with a minimum of technical terminology this book provides graphic descriptions of the nursing care of the neurological patient. The arrangement of the material is logical and it is presented in a cumulative and readily assimilable form.

An excellent presentation of the anatomy and physiology of the nervous system begins the book and this is followed by a very complete and comprehensive discussion of the diagnostic study of the patient. Each procedure is presented in a complete outline form covering: definition of the procedure, purposes, contraindications, equipment required, preparation of the equipment, preparation of the patient, procedure, aftercare of the patient, aftercare of the equipment, charting, and sequellae. Throughout the book the emphasis is on the nurse's responsibilities and duties but it also provides the nurse with an insight into the more technical aspects of the treatment.

Especially commendable is the attention to the details of nursing responsibility, as in the mental hygienic implications (explaining, reassurance, etc.); the nurses role in rehabilitation of the neurological patient; the specific instructions for posturing the patient; and the wealth of photographs illustrating the text. The single chapter on care of the unconscious patient, while not presenting any new material, is an excellent resume of the principles of the art and a science of nursing as applied to this type of patient.

The presentation of specific neurological and neurosurgical conditions is well-handled and the material of prime interest and importance to the nurse is given proper emphasis. The specific details of pre- and post-operative care are presented in such a way as to inspire a feeling of competence in the nurse who correlates such reading with clinical care of patients.

This text deals not only with the more common and severe neurological disorders but also is particularly notable for including such conditions as herpes zoster, sympathectomies of various levels, chordotomy, tractotomy, neurectomy, rhizotomy, and other conditions and procedures not commonly included in nurses texts.

In some portions the writing is perhaps too subjective in nature; this is particularly noticeable in the discussion of cerebral palsy in which the

authors definitely present a different attitude from that of other writers on the same disease. Their emphasis on the negative aspects of the prognosis is a formal text of this nature does not inspire the student's interest in the more positive features of the treatment of cerebral palsy.

The bibliography which concludes each chapter undoubtedly represents the most complete collection of references for nurses in this field that has ever been assembled and certainly is worthy of commendation. The appendix includes a complete glossary and a set of unit plans for the teaching of an eight week course in neurological and neurosurgical nursing.

The text is highly recommended to all nurses interested in the fields of neurology and neurosurgery and is an invaluable addition to any nurses library. For the hospital which offers a course in Neurology it answers a long-felt need for a complete up-to-date book on the nursing of these conditions.—*C. William Bushnell, R.N., B.A.*

*The Show of Violence. Frederic Wertham, M.D. Doubleday & Co., Garden City, N.Y. 1949. pp. 279. \$3.00.*

The author is a well known psychiatrist, long experienced in the forensic field, who also writes effectively. His "Dark Legend" (1941), with its description of the "catathymic crisis" was a useful and readable contribution to the literature of murder. In the present volume Dr. Wertham presents a series of case studies and draws some stimulating conclusions. His introductory chapter, "Psychiatry in the Court Room" is condensed and presumably for that reason omits some significant facts in the evolution of the concept of "insanity" as a defense to criminal charges. He is critical of the courts, police, society, and psychiatrists — and the examples he cites certainly seem to justify some of his strictures. There is the case of Robert Irwin, for example, in which three alleged psychiatrists assured the court of the defendant's sanity, although they had not examined him; that of Lavin, repeatedly arrested for various crimes, including homicide, but never convicted, thanks to influential "friends"; and "Medea", the inadequate widow, who in desperation killed her children.

Dr. Wertham emphasizes the interaction of the psychologic, the sociologic and the biologic factors in murder, all interacting and not at all mutually exclusive. The inner conflicts of man are closely connected with the outer conflicts in society. "Murder is not only an experiment of nature; it is an experiment of society. It not only reveals psychological laws of personality, but also indicates the workings of the society where it occurs" (p. 253). "How ever deeply you may penetrate the mind of the murderer, you cannot understand the dynamics of a murder case unless you have had a chance to see behind the facade of the social scene where it occurs" (p. 256). The Sicco-Vanzetti case, for example, could hardly have resulted in such a shocking miscarriage of justice except in the particular atmosphere which prevailed in Massachusetts in the early 1920's.

The psychiatrist and the general reader alike will enjoy reading the book.—*Winfred Overholser, M.D.*

Crime and the Mind. *Walter Bromberg, M.D.* J. B. Lippincott Co., Philadelphia 1948. pp. 219+viii \$4.50.

The author of this book speaks from a long and wide practical experience with this topic. For many years he was in charge of the Psychiatric Clinic of the Court of General Sessions in New York City and on the staff of the Psychiatric Division of Bellevue Hospital; he is no arm-chair criminologist. His presentation, therefore, may be expected to be a useful addition to the literature of an important subject, and in fact it is just that.

Part One is devoted to the Legal and Social Environment of the Criminal—the social attitudes toward the offender and his reactions to them, as well as a consideration of the present state of psychiatry in the criminal courts and the prisons.

Part Two deals with the Individual Criminal—Psychopathic Personality, Emotional Immaturity and Crime, The Neurotic Offender, and a closing chapter on The Cure for Crime. The mental mechanisms involved are discussed clearly and convincingly. Psychotherapy of the offender, both of the individual and group variety, is practicable in a certain proportion of cases, and should be employed in increasing measure; the psychiatrist must also act as counselor to social workers, probation officers, guards, and others who deal with the offender. As well it is important that society "be educated to view crime as a psychological illness, a disorder of the impulse life" (p. 179). He points out the progress along these lines already made, and is reasonably optimistic for the future.

An excellent bibliography, arranged by chapters, is appended.—*Winfred Overholser, M.D.*

The Commonsense Psychiatry of Dr. Adolf Meyer. *Alfred Lief.* McGraw-Hill Book Co., Inc., New York. 1948. pp. 677. \$6.50.

By the skillful combination of a biographical sketch and a collection of Adolf Meyer's original papers, this volume presents the development of Dr. Meyer as a psychiatrist and his concepts we know as psychobiology. In preparing this work, Alfred Lief drew extensively from his continual conferences with Dr. Meyer. The book provides a source-book of fifty-two of Dr. Meyer's edited collected works, many of which are little known and quite inaccessible to the average reader. Some are excerpts from papers delivered at various meetings and conferences. Among the better known papers included are: "An Attempt at Analysis of the Neurotic Constitution" (1903); "Fundamental Conceptions of Dementia Praecox" (1906); "The Dynamic Interpretation of Dementia Praecox" (1909); "Objective Psychology or Psychobiology" (1915); and "The Psychobiological Point of View" (1934). In addition to arranging the papers in a sequence, the editing in-

volves deleting some repetitious parts and combining some of the original papers into more concise single papers. The brief biography is by no means a dynamic study of the man. Instead, it is part a chronology and part an expression of Meyer's opinions and missionary struggles. The narrative portion of the book serves as a background for and transition between the groups of original papers.

The introduction is a 1921 paper, privately published, which is essentially the keynote of psychobiology—that man is a living unit, that life is seen as the activity and behavior of definite individuals, that “the human organism can never exist without its setting in the world,” that the study of life problems always concerns itself with the interaction of an individual organism with life situations. The emphasis is on the study of integration, not the summation of elemental factors. The book reveals Meyer's struggle with old dogma to make these notions so self-evident and widely accepted today. But Meyer did not evolve all this out of a clear sky, either. The sketch of Meyer's education prior to his coming to the United States in 1892 hints broadly at his ideological background. His 1933 paper on “British Influences in Psychiatry and Mental Hygiene” illustrates the effect of the British emphasis on organismal and functional considerations upon his own formulations.

In the succeeding sections, Meyer's work is traced from his first positions at Chicago and Kankakee, Illinois, through the periods at Worcester, Massachusetts, New York, and Baltimore. The books make passing mention of his personal contacts at the then new University of Chicago. Not much is made of this. Yet it would be important to evaluate the influence on him of this intellectual milieu which gave rise to pragmatism in philosophy, functionalism in psychology, and a sociological approach to human relationships. Like many others of yesterday and today, Adolf Meyer came into the field of psychiatry via the door of neurology, neuro-anatomy, and pathology. But he kept in mind and elaborated the idea that there were more mental findings in the life record of the patient than in the brains of the psychotics he was examining at autopsy. His work and papers at Kankakee, Worcester, and New York show the widening horizons of his interests and teachings. One gets the impression of a determined missionary in Meyer's efforts to vitalize the state hospitals and to teach psychiatrists to study patients as living functioning persons who have a history of development in a social setting. At the Phipps Clinic of Johns Hopkins University he had the opportunity to focus upon the training of psychiatrists.

On the whole, the presentation is quite readable and makes psychobiology somewhat more understandable as an approach to human living, not just a school of psychiatry. The brief glossary of technical terms which is appended is also well edited and helpful, and the contents are well indexed. In short, this book is highly recommended.—*Norman Taub, M.D.*

The Psychosis of Pellagra. Structural Analysis of the Psychic Disturbances. (*La Psicosis Pelagrosa. Un análisis estructural de los trastornos psíquicos.*) Bartolome Llopis. Editorial Científico-Médica. Barcelona-Madrid, 1946.

Although this book by Dr. B. Llopis on the Psychosis of Pellagra was published in 1946, it is still worthy of discussion, not only because of the detailed clinical observations included, but also—and more particularly—because of the treatment of psycho-pathologic concepts and interpretations.

Pellagra as a deficiency disease is regarded as a single process manifesting itself during its course by a variety of psychic syndromes, the character of these manifestations depending upon individual susceptibilities towards the individual deficiencies of the various elements of the vitamin-B complex, the whole process being modified in an unfavorable sense by chronic alcoholism. There is no such thing as a specific psychosis of pellagra. There are, however, a vast variety of non-specific forms of exogenic reaction, succeeding one another in the same patient, either as gradual transitions from one to the other, or as sudden outbursts, or even co-existing temporally. These exogenic reaction syndromes are not distinct forms; they are, rather, distinct phases or stages of the same psychotic process or axial syndrome. The distinctive qualitative manifestations of these psychotic stages are fundamentally only structural variations of a purely quantitative character stemming from a single basic disturbance. This fundamental disturbance is regarded as resulting from a more or less important descent in the level of consciousness. By the word consciousness is meant the entire, or global, activity of the psyche, thus departing to a certain extent from the newer, too purely physiologic, conceptions of the somatic theorists.—(*Abstracted from Book Review by Gonzalo R. Lafora, of Madrid, Spain*).

## 16. Notes and Announcements

### *International Congress of Psychiatry*

*Paris, October 4th-12th, 1950*

An International Congress of Psychiatry will be held in Paris from October 4th to 12th, 1950.

In accordance with regulations decided on at the International Preparatory Meeting (Paris, October 23rd, 1947) the official spoken languages will be: English, French, Spanish and (should Russia participate) Russian.

The program of the six main afternoon sessions includes:

- (1) GENERAL PSYCHOPATHOLOGY. Session's Chairman: Professor Ferdinand Morel (of Geneva, Switzerland). Subject: *Psychopathology of Delusions*.
- (2) CLINICAL PSYCHIATRY. Session's Chairman: Professor Honorio Delgado (Lima, Peru). Subject: *Application of Testing Methods to Clinical Psychiatry*.

- (3) PSYCHIATRIC ANATOMO-PHYSIOLOGY. Session's Chairman: Professor F. L. Golla (Bristol, England). Subject: *Cerebral Anatomy and Physiology in the Light of Lobotomy and Topectomies*.
- (4) PSYCHIATRIC BIOLOGICAL THERAPY. Session's Chairman: Professor Jozef Handelsman (Warsaw, Poland). Subject: *Respective Indications of the Shock Therapy Methods*.
- (5) PSYCHOTHERAPY, PSYCHOANALYSIS, PSYCHOSOMATIC MEDICINE. Session's Chairman: Dr. Franz Alexander (Chicago, U.S.A.). Subject: *The Evolution and Present Trends of Psychoanalysis*.
- (6) SOCIAL PSYCHIATRY. Session's Chairman: Professor Torsten Sjögren (Stockholm, Sweden). Subject: *The Genetic and Eugenic Aspects of Psychiatry*.

In addition, these six sections and the seventh section (CHILD PSYCHIATRY) will organize for the morning sessions a number of meetings, symposia and work sessions.

The Organization Committee plans to set up two exhibits in connection with the Congress, the first one on Art and Psychopathology (apply to Dr. Bessière, Centre Psychiatrique Ste-Anne, 1, rue Cabanis, Paris XIV<sup>o</sup>); the second on History of Psychiatric Progress (Professor Laignel-Lavastine, 12bis, place Laborde, Paris VIII<sup>o</sup>).

The French Committee was entrusted, at the International Preparatory Meeting, with the organization of the Congress. This Committee, set up in 1947, is as follows:

- Honorary Chairmen:* Professor Pierre Janet (in memoriam);  
Professor Jean Lhermitte. (Paris).
- Chairman:* Professor Jean Delay (Paris).
- Vice-Chairman:* Dr. L. Marchand (Paris); Dr. Henri Baruk (Paris);  
Professor P. Delmas-Marsalet (Bordeaux);  
Dr. Georges Heuyer (Paris).
- General Secretary:* Dr. Henri Ey (Paris).
- Treasurer:* Dr. P. Sivadon (Ville-Evrard, Neuilly-sur-Marne, Seine & Oise).

In each country, a National Committee of the Congress is being set up; when possible, a Chairman, a Secretary, and a Director are appointed for each section.

General Management: Dr. Henri Ey, General Secretary, 1, rue Cabanis, Paris XIV<sup>o</sup>.

## NOTE

The Quarterly Review is glad to welcome a newcomer to the journalistic field—Electroencephalography and Clinical Neurophysiology.

This quarterly, the official organ of the International Federation of Electroencephalographic Societies, is edited by Dr. H. H. Jasper of Montreal, with the co-editorship of Dr. W. Grey Walter of Bristol, England. Dr. Robert G. Schwab of Boston is managing editor. The substance and typography of the first number (February 1949) are excellent.

## ANNOUNCEMENT

The New York University Film Library announces a series of psychiatric films on integrated development for the profession. These films were taken at the New York Infirmary under the direction of Dr. Margaret E. Fries, psychoanalyst. The scenes in the films start with birth and continue until the tenth year of life. The psychiatric material is integrated with the physical and sociological. The case history also has the findings of the Rorschach done by Zygmunt Piotrowski. Brief guides accompany each film. For information, please write to the New York University Film Library, 26 Washington Place, New York 3, N.Y.

## POSTGRADUATE COURSES AT THE UNIVERSITY OF VIENNA

The Austrian State Tourist Department announces that postgraduate courses for physicians and surgeons are again being offered at the University of Vienna for the first time since the war. These courses were well and favorably known before, especially by students of the specialties, and should now be as good or better.

The courses available, with their directors, are:

1. Surgery. Prof. L. Schoenbauer, M.D., and Prof. W. Dank, M.D.
2. General Medicine. Prof. E. Landa, M.D. and Prof. Fellingner, M.D.
3. Obstetrics and Gynecology. Prof. T. Antonie, M.D. and Dr. Husslein.
4. Psychiatry and Neurology. Prof. O. Kauders, M.D.
5. Skin and Venereal Diseases. Prof. L. Arzt, M.D. and Prof. A. Wiedmann, M.D.
6. Ear, Nose and Throat Diseases. Prof. E. Schlander, M.D. and Prof. C. Wisthe, M.D.
7. Diseases of the Eye. Prof. A. Pillat, M.D. and Prof. K. Linder, M.D.

Suitable living accommodations are available for overseas doctors desiring to do postgraduate work. Further information can be obtained from the Austrian State Tourist Department, 48 East 48th Street, New York 17, N.Y.



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